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Birds of Goa

A Reference Book

Heinz Lainer

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by

Heinz Lainer

With 20 ink sketches by Sachin Jaltare

THE GOA FOUNDATION

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by Heinz Lainer

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Preface

Having settled down in Goa in 1974, I again took up ornithology – my old hobby of younger days – in 1980. The identification of birds posed then a great problem: the only field guide, Salim Ali's *The Book of Indian Birds*, described and depicted only about a tenth of India's avifauna of 1300 or so species, and his exhaustive *Handbook of the Birds of India and Pakistan*, written in collaboration with S.D. Ripley, had been out of print for years. To look up any 'first sighting' entailed a trip to Panaji, Goa's capital, where eight out of the altogether ten volumes of this monumental work were available at the Central Library. The birder's life became somewhat less cumbersome when the compact edition of the *Handbook* was published in 1983, and outright easy with the appearance of Ali and Ripley's *Pictorial Guide to the Birds of the Indian Subcontinent*, in 1995.

Sometime in 1999, Paul I. Holt approached me with the proposal to jointly write a book about Goa's avifauna. Together with Mark Newscombe he had collated and critically evaluated over 90, mostly unpublished, 'trip reports', stretching from 1993 to 2000, by British, Dutch and Scandinavian birdwatchers that had visited Goa. He himself had come to Goa seven times on 2-week birdwatching trips, partly as a professional guide for a travel agency specializing in tours for 'birders' and had kept meticulous diaries. He sought to flesh out this extensive collection of data with my material of, then, 19 years of fairly intensive and year-round birdwatching in Goa. However, in 2001 P.I. Holt found it impossible to continue the collaboration and I proceeded on my own, trying to amalgamate all extant published material about Goa's birdlife, Holt's data collection and the diaries of Gordon Frost, the only other resident birdwatcher (since 1993), with my own notes from 1980 till August 2002.

This book is primarily intended as a reference work for Indian ornithologists and serious birdwatchers. It attempts to provide information on the habitat, population, distribution, migration, breeding status and any locally relevant data of all the 420 bird species that have been reliably recorded in Goa.

Secondarily, it is meant for the visiting 'birder' to be used in addition to or in conjunction with any of the existing field guides. It will give him an idea in which habitat and at which site to be on the look-out for a sought-after bird species and if his sighting of a particular bird species is a more or less common occurrence or extraordinary or close to impossible. Since visiting birdwatchers tend to flock to Goa only during the so-called 'cool season' – early November to late March – this book will provide information on a species' year-round status and, in case of migrants, on arrival and departure dates. A map is added to facilitate locating a site on any of the often inaccurate 'tourist maps' of Goa (accurate maps of Goa or, for that matter, India are commercially unavailable).

Finally, a word of caution to visiting birdwatchers: Goa abounds with families and genera of birds that do not have representatives in Europe and are therefore often totally baffling to the newcomer. Moreover, many common and not-so-common bird species of the Palaearctic occur as winter visitors in Goa, though often in the form of eastern subspecies that the European birdwatcher is not familiar with. Many visiting birders stand under such great pressure, considering the investment in preparation, time and money, that they feel compelled to squeeze out of their short stay the utmost in returns, i.e. first sightings. Many of these often doubtful, sometimes absurd records find their way into unpublished trip reports. To the best of my knowledge, no visiting birder, except Paul Holt, has ever attempted to have his more outstanding sightings published in a serious and scientific Indian periodical like the *Journal of the Bombay Natural History Society* (J. Bombay nat. Hist. Soc.) where they would be subject to peer review.

Heinz Lainer
Praias de St. Antonio, Anjuna

12th October 2003

Introduction

Historical Notes

The first documentary evidence of the very existence of birds in Goa, let alone any ornithological activity, comes from P. Boddaert's 'Table des planches enluminéez d'histoire naturelle de M. d'Aubenton' from 1783 in which he gave the type locality of the White-naped Woodpecker *Picus festivus* (= *Chrysocolaptes festivus*) and the Red-wattled Lapwing *Tringa Indica* (= *Vanellus indicus*) as Goa, *ex* Daubenton, pl. 696 (p. 43) and pl. 807 (p. 50). J. F. Gmelin in his *Systema naturae* (1788-1789) described *Parra goensis* (= *Vanellus indicus*) and Picus *goensis* (= *Chrysocolaptes festivus*) from Goa (1: 434) and (1: 706).

During the hundred years that followed this Age of Enlightenment, nothing seems to have moved in Goa, least of all birds. The Portuguese, unlike their counterparts in British India, were not interested in the study of birds, or any fauna for that matter. Unless they were was shooting them for the pot. This attitude seems to have rubbed off on their colonial subjects of 410 years and is still largely prevalent.

A. O. Hume (1876), while sailing past Goa in February 1875 on his way to the Laccadive Islands (now Lakshadweep), stopped only for a couple of hours at St. George's Island off the Marmagoa headland and contributed very few observations. Further snippets of information came from ornithologists who worked the adjacent areas of British India: Vidal (1880) in the South Konkan to the North of Goa and Davidson (1898) in North Kanara to the South. Occasionally they 'strayed' into the border areas and trained their 'spy glasses' on birds.

Another almost 100 years of inertia and disinterest followed until Goa, after 451 years of colonial rule, was finally merged into India in 1961. It was then apparently considered *terra incognita*, so much so that the Kolkata-based Zoological Survey of India (ZSI) sent 'several parties to explore the faunal wealth of this place'. This resulted in a paper by B. C. Saha and J. M. Dasgupta (1992) based on the ornithological material collected during several trips between 1968 and 1978. At roughly the same time, the Government of the erstwhile Union Territory of Goa, Daman and Diu commissioned the Bombay Natural History Society to conduct an

ornithological survey. This led to a 16-day collecting trip by R. B. Grubh and Dr. Sálim Ali in November-December 1972. Work was focused on the belt of evergreen and moist deciduous forests of the Western Ghats and consisted, as with the teams of the ZSI, mainly of collecting specimens for taxonomic study. This field trip led to the publication of their 'Birds of Goa' (1976), which lists 100 species that were collected (with 150 specimens) and an additional 54 species sight recorded. U. Rane (1983) visited the same area three times for altogether 19 days, in May 1981 and April and June 1982, and added a further 33 species to this list.

Physiography

(Part of the information of this chapter was gleaned from two publications: the *Gazetteer of the Union Territory of Goa, Daman and Diu, Part I: Goa*, edited by V. T. Gune and published in 1979 by the Government Printing Press, Panaji, and the excellent *Fish Curry and Rice – a source book on Goa, its ecology and life-style* (revised fourth edition), edited by Claude Alvares and published by the Goa Foundation, Mapusa.)

Goa, India's smallest state, is a relatively narrow strip of land, about 105 kilometres in length, up to 65 kilometres wide and covering an area of 3701 sq.km, on the West coast of peninsular India. It is flanked by the Arabian Sea in the West and the Western Ghats (or Sahyadris) in the East and lies between the latitudes of 15°48'00" and 14°53'54" North and the longitudes of 74°20'13" and 73°40'33" East.

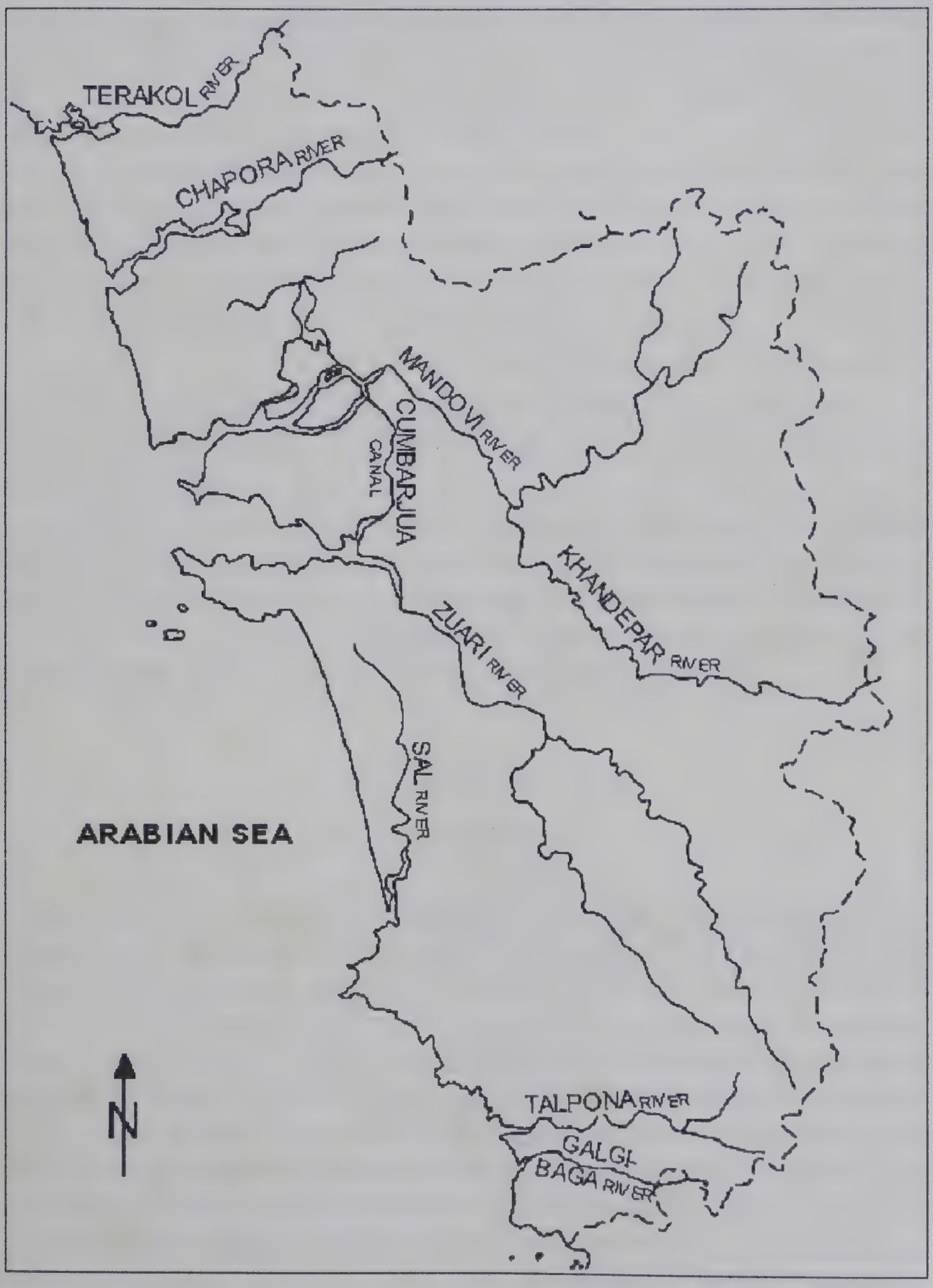
There are three main physical divisions: the hilly region of the Western Ghats in the East, the midland region with its plateaus and the low-lying river basins with the coastal plains in the West.

The Western Ghats

Goa's section of the Western Ghats or Sahyadris runs roughly North to South in an arc of hills whose *ca.*125 kilometres long crestline constitutes the eastern border with the neighbouring state of Karnataka. Tropical wet evergreen forest occurs in strands and patches in the deeper and less accessible valleys over an area of about 200 sq.km. Tropical moist deciduous and semi-evergreen forests account for approx. 400 sq.km.

The average elevation is *ca.* 800 metres, several hundred metres lower than the adjoining sections to the North and South. This physical feature gave rise to the expression 'Goa gap'. Geologically, the northern extreme is of the Deccan trap type

Physical Map of Goa



with basaltic, horizontally layered vertical cliff-faces reminiscent of South Maharashtrian hill stations like Amboli, while the much larger central and southern part consists mainly of the rounded and densely wooded hills and ridges characteristic of the Uttar Kanara Ghats to the South. Biogeographically, Goa lies at the point of transition from the Northern to the Southern Sahyadris. In Goa itself, this point of transition lies roughly east of Valpoi. For a good number of resident as well as seasonally visiting bird species that are typical of the Southern Sahyadris and Southern Western Ghats this is the northern limit of distribution, e.g. Malayan Night Heron, Black Baza, Crested Goshawk, Rufous-bellied Eagle, Orange-breasted Green Pigeon, Mountain Imperial Pigeon, Sri Lanka Frogmouth, White-rumped and Brown-backed Needletail, Blue-eared Kingfisher, Crimson-fronted Barbet, Common Flameback, Speckled Piculet, Large Woodshrike, White-bellied Treepie, Black-crested and Grey-headed Bulbul, Wynaad Laughingthrush, Brown-breasted and Rusty-tailed Flycatcher, Blue-throated Flycatcher, Thick-billed Warbler, Indian Blue Robin, Little Spiderhunter and Black-throated Munia.

Large parts of Goa's Western Ghats strip are inaccessible though a walk along the Chorlem Ghat (the road from the Anjunem dam to Belgaum via Surla) and the Anmod Ghat (the National Highway 4A between Mollem and Anmod) will provide a glimpse into the interior of this densely forested area. The best way to explore the central part of Goa's Ghat section is a hike along the Braganza Ghat, where the former Western Indian Portuguese Guaranteed Railway climbs over 500 altitude-metres from Collem to Castle Rock through largely virgin forests.

For an excellent overall account of the various features of the Western Ghats see Daniels (1997).

The Midland Region

This intermediate area between the Western Ghats and the coastal plains consists largely of lateritic plateaus, a characteristic feature of Goa and the entire South Konkan. Of between 30 and 150 metres in height, these plateaus are covered with stunted cashew trees, thorn scrub and coarse grass. In many areas they are deeply notched by ravines and gullies that, together with the lower scarps and plateau bases, support patches and strands of dense remnant semi-evergreen forest. Numerous perennial springs feed intensive cultivation of areca, coconut, spice, fruit and paddy in the, often terraced, valleys between plateaus. In several places plateaus advance deep into the coastal belt and, where they meet the coastline, form rocky headlands that are invariably topped by forts, e.g. Terakol, Chapora, Aguada, Cabo Raj Niwas, Mormugao and Cabo de Rama.

A great part of this region, extending in a wide arc through almost the entire length of Goa, is indelibly scarred and irreversibly degraded by large scale open cast and strip mining of iron and manganese ore, the mainstay of Goa's economy. To this are added an ever-growing number of government-sponsored industrial estates and, often highly polluting, large factories to create a landscape of extremes – of breath-taking beauty on the one hand and indescribable ugliness on the other.

The Coastal Belt

This ecologically distinct zone extending in a width of 12-15 kilometres along Goa's *ca*. 105 kilometres long coastline contains about 80% of the state's population. With its sandy bays, beaches and rocky headlands, broken by the wide estuaries of the Mandovi and Zuari rivers and interspersed with minor estuaries, it is characteristic of the South Konkan coast. Behind the coast stretches a picturesque patchwork quilt of pastures and paddy fields, well-wooded villages, groves of coconut palms and evergreen fruit trees, creeks and rivulets, saltpans and saline as well as freshwater marshes.

An integral part of this coastal ecosystem are the river basins. These alluvial extensions of the coastal belt reach in the form of lowland bays along the rivers up to 45 kilometres into the midlands. In this sub-zone, numerous wetlands – saline, brackish and freshwater – and the over 2000 hectares of mangroves that line the rivers and creeks provide excellent habitats for resident and migratory birds.

Other Physical Features

In South Goa, a spur of the Western Ghats branches off towards the West and meets the Arabian Sea at Cabo de Rama. Several 400-500 metres high isolated hills dot the midland region in South Goa, e.g. Chandranath and Sidhanath hills. Vagheri hill in Sattari *taluka*, with 792 metres Goa's highest, is divided from the main chain of the Western Ghats only by the Thane valley.

A typical feature, mainly of the central and southern part of Goa, are tanks. These are man-made reservoirs to store monsoon water for the cultivation of the winter *vaingonn* paddy-crop. All the so-called lakes in Goa, e. g. Carambolim lake and Mayem lake, are actually village tanks. Almost all these artificial water bodies have become infested with the obnoxious floating *Salvinia molesta* weed, which deprives other vegetation of oxygen and wintering ducks and waterfowl of open water surfaces.

Climate

Goa's maritime, monsoon-type climate is equable and moist or humid throughout the year. Except for the monsoon season it is tropical temperate with little demarcation between the cold and hot weather periods. Annual rainfall is 250-320 centimetres along the coast and 510-760 centimetres on the upper slopes of the Western Ghats. Over 90% of precipitation occurs during the four months of southwest monsoon from June to September.

Seasonal variation in temperature is slight. May, the hottest month, has a mean daily temperature of about 30° C, while January, the coolest month, ranges around 25° C. Due to the proximity of the sea, the diurnal range of temperature is not wide: 4-6° C during monsoon and 10-12° C in January-February.

Relative humidity can reach 100% during monsoon and sinks even during the dry season only rarely below 60%.

Due to the coriolis force, the centres of cyclones in the Arabian Sea usually bypass Goa though outrunners, even of cyclones in the Bay of Bengal, may cause freak weather conditions with high winds during several weeks every year, mainly between April and September.

Conservation

Bhagwan Mahavir Wildlife Sanctuary and Mollem National Park

The state's oldest, biggest and, from the birdwatchers viewpoint, best and most interesting wildlife sanctuary was created in 1967, when a 240 sq.km area of moist deciduous, semi-evergreen and prime wet evergreen forest ranging from the foothills to the highest ridges of the Western Ghats was declared a game sanctuary. In 1982 it was re-notified as a wildlife sanctuary and in 1978 a core area of 107 sq.km was carved out as the Mollem National Park.

The Bhagwan Mahavir WS is still largely unspoiled but increasingly opened up to tourism. Mammalian wildlife has shown a remarkable resurgence from near non-existence at the end of the colonial era and since Grubh and Ali (1976) commented on its sorry state in the early seventies.

This sanctuary is accessible by the Ring Road, the Sunset Point trail and jeepable forest tracks that run from Mollem and Collem via the Devil's Canyon and Sonaulim up to the foot of the magnificent Dudhsagar waterfalls. To get a glimpse of the otherwise inaccessible tracts of dense wet evergreen forest on the slopes one has to take a train from Collem railway station to Castle Rock (Uttar Kanara, Karnataka) and walk down along the tracks of the former Western India Portuguese Guaranteed Railway.

Accommodation is available in the cottages of the Mollem Tourist Complex at the foot of the Anmod Ghat section of the National Highway 17.

Bondla Wildlife Sanctuary

This bowl-shaped valley is situated in a cluster of outlying hills that is detached from the main body of the Western Ghats by about five kilometres. Its eight sq.km were notified as a game sanctuary in 1968 and, surrounded by extensive open cast iron ore mines, contain a small zoological garden of sorts, a deer park, flower gardens and some tourist cottages. This makes the Bondla WS a popular picnic spot but hardly a wildlife sanctuary. However, plenty of birdlife representative of the

lower slopes of the middle section of the Western Ghats are to be found along the approach road from the West. The sanctuary consists mostly of mixed moist deciduous forest with small semi-evergreen patches.

Cotigao Wildlife Sanctuary

Notified in 1968, the Cotigao WS occupies a kind of hybrid position between the three regions. Its 86 sq.km show at the lower western end, which is just 8 kilometres from the sea, certain coastal influences, the central part displays several characteristics of the midlands while the eastern interior region is typical for the base and lower reaches of the Western Ghats, from which it is divided by the valley of the upper Zuari river.

Two rivers, broadly lined with lush riverine forests, dissect the sanctuary. Large tracts of moist and dry deciduous forest are interspersed with patches of semi-evergreen woods, and rubber, teak and eucalyptus plantations. There is a sprinkling of hamlets whose mostly tribal population is not yet completely weaned away from its traditional slash-and-burn method of cultivation. Poaching, large-scale illegal tree felling and smuggling of liquor are rampant in the sanctuary.

Madei and Netravali Wildlife Sanctuaries

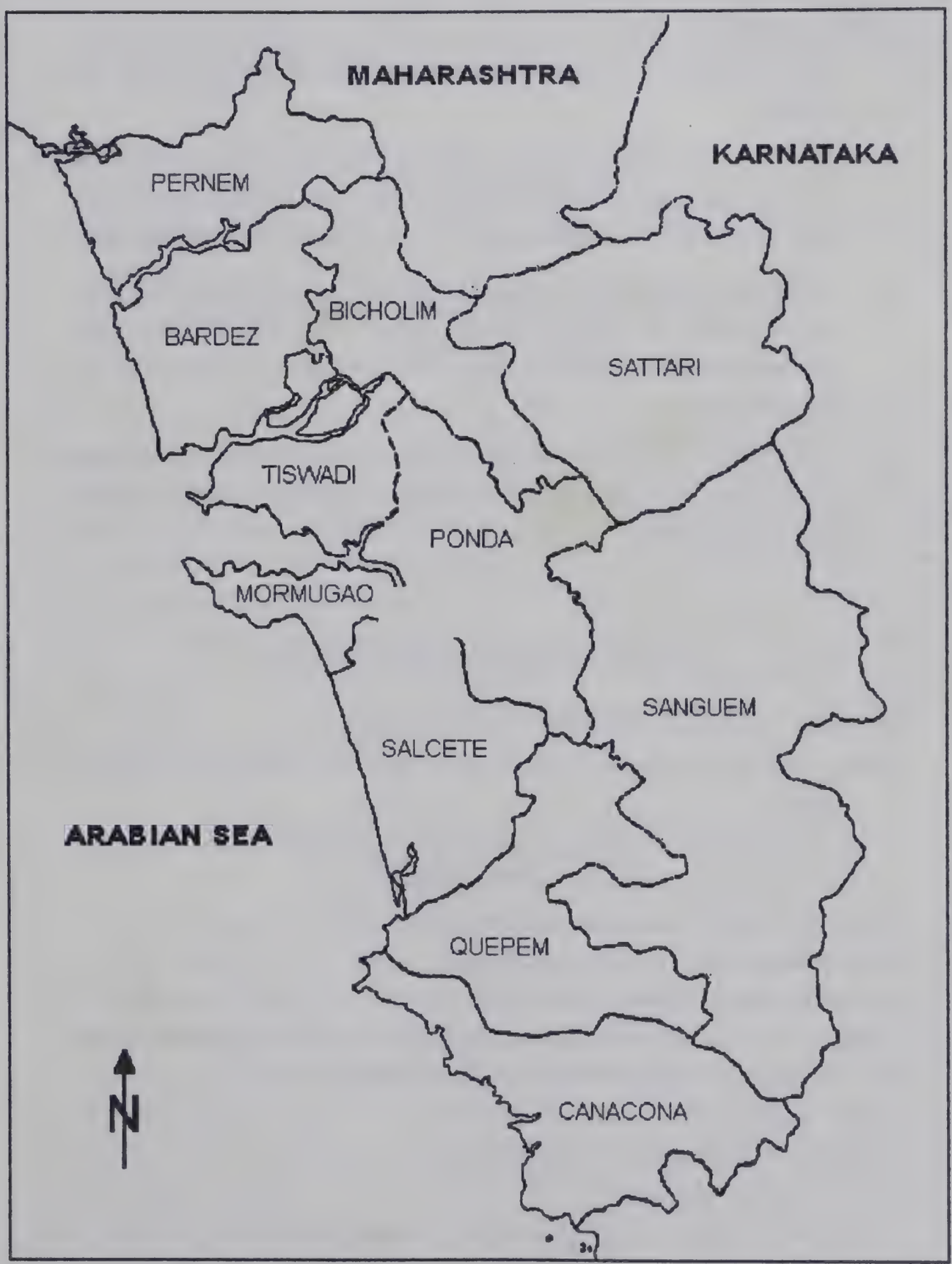
During a short spell of so-called President's Rule in 1999, environmental activists of the Bombay Natural History Society persuaded the governor to declare the Madei and Netravali Wildlife Sanctuaries. With this controversial move, almost the entire Western Ghats strip in Goa has come under protection.

The Madei WS provides a link between the reserve forests of Sawantwadi (Maharashtra) and the Bhagwan Mahavir WS. 78% of its 208.5 sq. km area are under forest cover. The Netravali WS (211 sq. km) bridges the corridor between the Bhagwan Mahavir WS and the Cotigao WS.

Dr Salim Ali Bird Sanctuary

This latest (notified in 1988), and with just 1.8 sq.km smallest, of Goa's sanctuaries is situated at the westernmost tip of Chorao, an alluvial island in the inland estuary of the Mandovi river. It consists of Goa's last sizeable mangrove forest and is therefore certainly worthy of protection but contains no birdlife worth mentioning. Access is by boat only and many of the creeks are impenetrable due to the dense growth of mangroves.

Taluka Map of Goa



A Note on the Systematic List

- All records and observations, if not credited otherwise, are by the author.
- The sequence followed here is that of Sibley & Monroe (1993) as used by Inskipp *et al.* (1996) and Grimmet *et al.* (1998), since theirs appear to be the field guides most commonly used by visiting birders.
- The number in brackets before the species name refers to the 'Synopsis number' as used by Ripley (1982) for the use of Indian ornithologists and birdwatchers who tend to be more familiar with his taxonomy.
- The name of the *taluka*, an administrative unit, is given in brackets after village and place names to facilitate locating of places and sites on a detailed map.

Brief Glossary and Abbreviations

Borassus – *Borassus flabellifer*, Palmyra Palm

bundh, bandh – any kind of dyke or low dam, often planted with coconut palms

Ciba-Geigy – the Santa Monica plant (at Corlim) of Hindustan Ciba-Geigy Ltd., later 'Novartis', now 'Syngenta India Ltd.'

Pandanus – a branching palm growing near water

rabi – the rain-fed monsoon paddy crop

rampon – large, hand-operated beach sein-net

shola – a patch of dense wet evergreen forest in a hollow amongst rolling grassy hills at the crest of the Western Ghats

taluka – administrative unit

vaingonn – the irrigated winter paddy crop

WS – Wildlife Sanctuary

*, **, *** - denotes the likelihood of occurrence at a site

SYSTEMATIC LIST OF SPECIES

PHASIANIDAE

Partridges, Francolins, Snowcocks, Quails and Pheasants

(250) **Common Quail** *Coturnix coturnix* (Linn.)

(Grey Quail, Quail)

First reported by Grubh and Ali (1976), who noted it at Valpoi during their ornithological survey of Goa, between 27th November and 12th December 1972. **Status**: A rare and probably much overlooked winter visitor. Occurs in the coastal belt and, possibly, at the foot of the Western Ghats. **Habitat**: Grassy lateritic plateaus, wasteland and fallow fields. **Sites and sightings:** Two birds were observed on the plateau behind the fort at Terakol on 8th February 1986 and a single bird was seen twice in a dry bed of sedges at the upper Baga creek on 17th and 31st January 1996. **Remarks:** One should be very cautious in identifying Common Quail, especially in areas where bush quails occur as well. Their sizes are almost identical and so are their backs when flushed out from cover.

(252) **Rain Quail** *Coturnix coromandelica* (Gmelin)

(Black-breasted Quail)

First recorded on 2nd September 1996 at Divar-Navelim. **Status**: A scarce but regular and extremely local monsoon visitor. This species was certainly not present in Goa before 1991, possibly not even before 1996. **Sites**: Primarily found on pastures and fallow paddy-fields around the single large tree beside the road at Divar-Navelim it also occurs on grassland and in brackish sedge marshes to the left and right of the causeway leading from Divar-Piedade to the Divar-Old Goa ferry. Twice observed in just-harvested paddy-fields north of Saligao village. **Population**: The highest number (5+ birds calling, at Divar-Navelim) was recorded in 1996. Since then numbers have declined steadily till during the monsoon of 2000 only a single bird was heard at Divar-Navelim. The year 2001 has seen a recovery to three or four calling specimens. **Breeding status**: Very strong site fidelity suggests possible or even probable breeding, but no proof exists. **Seasonal status**: The season's first calls were heard in

1996 on 2nd September, in 1997 on 3rd September, in 1998 on 3rd September, in 1999 on 4th September, in 2000 on 9th August and in 2001 on 7th June. Calls cease towards the end of September/beginning of October, the latest having been recorded on 17th November. **Remarks**: This quail is unmistakeable by its call, a double-syllabic 'whick-whick', very similar in pitch and quality to the Common Quail's 'whick-wher-whick'. Some local populations of the Oriental Skylark incorporate a fairly good imitation into their song, giving the impression of a Rain Quail calling in the far distance. The only chance to see this extremely secretive bird is in the early stages of the southwest monsoon when the fresh grass is only a few centimetres high.

(255-8) **Jungle Bush Quail** ***Perdicula asiatica*** (Latham)

(Jungle Quail)

First recorded on 7th April 1981 at Terakol. **Status**: This Indian subcontinent endemic is a scarce, unobtrusive and very locally distributed resident of the coastal belt and midland region. **Habitat**: Primarily found in areas of dry open scrub on lateritic plateaus and ridges; it is occasionally recorded in light woodland and arid lowland. **Sites and sightings**: Terakol (3 records), Carambolim lake area (2) and one sighting each at the Dona Paula plateau, Chorao-Tikanem, Baga hill, Mayem lake and Selaulim. **Observers**: Gregory (1999), Hill (1998a), Holt (1996a), Manners (pers. comm. to Holt, 1997), Rane (1984a) and the author. **Population**: Mostly met with in groups of 2-6 birds. The largest congregations, up to 20 individuals, were seen consistently on the plateau behind the Terakol fort. **Breeding status**: Courtship display by several males was observed on 17th June 1986 on the Terakol plateau. **Seasonal status**: Recorded in all months except July, August and November.

(275-7) **Red Spurfowl** ***Galloperdix spadicea*** (Gmelin)

First reported by Grubh and Ali (1976), who noted it at 'various localities' during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: Endemic to the Indian subcontinent, this fowl is an uncommon, locally fairly common, thinly spread breeding resident, from coastal villages to the crest of the Western Ghats. **Habitat**: Typically found in secondary and moist deciduous, but also in semi-evergreen and evergreen forests of the Western Ghats, patches of remnant semi-evergreen woodland in the midland region and the coastal belt as well as in areas of densely overgrown ruins in coastal villages. **Sites**: Terakol*** (Pernem); Nagoa valley*, Anjuna, Chapora Fort, Sinquerim, Baga hill (Bardez); Dona Paula, Carambolim, Taleigao (Tiswadi); Bondla WS (Ponda); Bhagwan Mahavir WS, Mollem, Kalay, Selaulim, Neturlim (Sanguem); Chandranath hill (Quepem), Cotigao WS (Canacona). **Breeding status**: Apparently there are at least two breeding seasons. A clutch of five eggs was found on the outskirts of Terakol, on 3rd September 1988; half-grown chicks were observed in March, April and May. **Seasonal status**: No seasonal movements are discernible. This fowl shows very strong site fidelity.

(301) **Grey Junglefowl** *Gallus sonneratii* Temminck

First reported by Saha and Dasgupta (1992) who collected two sub-adult cocks in the Bhagwan Mahavir WS, on 5th January 1969, during one of their collecting trips for the Zoological Survey of India. **Status**: This Indian endemic is an uncommon to locally fairly common breeding resident of the entire Western Ghats strip, foothills to crest, and its outlying isolated hills. **Habitat**: Semi-evergreen and wet evergreen forest. **Sites**: Surla (Sattari); Bondla WS*** (Ponda); Mollem, Collem, Bhagwan Mahavir WS** (Sanguem); Cotigao WS* (Canacona). **Breeding status**: A hen with 3 half-grown chicks was observed in evergreen forest on the top of Dudhsagar waterfalls on 21st April 2001. **Seasonal status**: Present throughout the year. No migratory movements were recorded. **Remarks**: The Grey Junglefowl is shy, seldom venturing far from cover and consequently rarely seen. It is often fairly tame elsewhere in its range e.g. in Periyar NP in Kerala and Anamalai WS in Tamil Nadu. Its extreme shyness in Goa is probably a relict from the days of indiscriminate hunting during Portuguese colonial rule (Holt 2000).

(311) **Indian Peafowl** *Pavo cristatus* Linn.

(Common Peafowl, Blue Peafowl, Peacock)

First reported by Rane (1983), who observed it at Mollem and Bondla during his Goa trips from 18th – 24th May 1981, 6th – 10th April and 16th – 22nd June 1982. **Status**: Endemic to the subcontinent, this is a fairly common, locally common and locally distributed breeding resident of the coastal belt and the entire midland plateau region up to the foot of the Western Ghats. **Habitat**: Scrub covered hillsides, plateaus, ridges and headlands, well-wooded village outskirts and undergrowth in degraded woodlands and secondary forest. **Sites**: Terakol***, Mandrem, Parshem (Pernem); Nagoa valley, Anjuna, Aguada plateau**, Tivim-Damedem, Assonora (Bardez); Sanquelim (Bicholim); Valpoi (Sattari); Chorao, Old Goa, Sao Pedro, Ciba-Geigy (Tiswadi); Sancoale plateau (Marmagoa); Mollem (Sanguem); Cotigao WS (Canacona). **Breeding status**: Two out of five just a week old chicks were captured by locals at Terakol on 3rd August 1988. **Seasonal status**: No seasonal movements were noticed. **Population**: Maximum numbers seen in any locality were 16 birds on the Aguada plateau, on 27th January 2000 (Lassey 2000) and 15 in December 1998 (Wadsworth 1998). Two cocks and seven hens were recorded at Terakol on 18th June 1986. In the early eighties, the population was restricted, probably due to unchecked hunting during colonial times, to a dozen peafowl or so at Terakol and several groups of a similar size on plateaus in the midland region, like the ones at Assonora and Sanquelim. Since then, numbers have increased steadily, in the early nineties even rapidly. This was combined with a westward expansion towards the coast, which was reached – via rocky headlands – sometime between 1990 and 95. The most plausible reason for this remarkable recovery and territorial advance is the increasing degradation of the forest cover of which the peafowl population is

known to be an excellent indicator. **Remarks**: Harris's implied comment (Harris 1996) that the Goan population is an introduced one is certainly incorrect. This species, in keeping with many of the state's other game birds, is invariably nervous and shy, behaviour that is probably a legacy of the Portuguese days of hunting (Holt 2000).

DENDROCYGNIDAE
Whistling-ducks

(88) **Lesser Whistling Duck** *Dendrocygna javanica* (Horsfield)
(Lesser Tree Duck, Lesser Whistling Teal)

First recorded on 5th May 1981 when 35+ birds settled about 200 metres off the shore on the waters of the Velsao bay. **Status**: An abundant winter visitor and bi-annual passage migrant, scarce summer resident (with only a few birds lingering during the monsoon) and even rarer breeder. **Habitat**: Primarily freshwater bodies like ponds, tanks and lakes. Occasionally found in a saline environment like estuaries and coastal bays. Regularly observed traveling up to two kilometres offshore during migration. **Sites and population**: Over 35 birds settled *ca*. 200 metres offshore in the Velsao bay on 5th May 1981 and *ca*. 15 on the fully saline Chapora river at Siolim on 8th November 1983. The Lesser Whistling Duck is a regular winter visitor at the Pilar pond (up to 51 birds) and the Curtorim tanks (up to 1000+), an occasional winter and/or summer visitor at the Batim tank (up to 33), Merces (up to 50+), Santa Cruz creek (up to 5) and Velim lake (up to 150+). At the ponds in the Ciba-Geigy compound, increasingly large numbers of this duck are found annually on spring passage. Maximum numbers were 1300+ in March 1997, 2500+ in March 1998, 4000+ in April 1999, 3900+ in April 2000, 810+ in April 2001 and 5200+ in April 2002. The largest mid-winter numbers are regularly counted at the Carambolim lake:

1989	200+	1997	1000+	2000	10 000+
1990	400+	1998	8000+	2001	2135+
1996	500+	1999	6000+	2002	5700+

Singles were seen at the Baga creek, Palolem marsh and on Divar. **Breeding status**: There are only three breeding records – a pair leading two downy chicks at the Pilar pond in late September 1989 and at the Carambolim lake in early October 1996 respectively and two youngsters at Pilar in late September 1999. **Seasonal status**: Inward migration starts during the first half of October while outward movement lasts through May into the first week of June. Up to a dozen birds stay on regularly during the southwest monsoon, shifting restlessly from one wetland to the next. **Migratory movements**: Incoming as well as outgoing offshore migration has

been observed with up to 430 birds per hour skimming low over the surface at distances of between a few hundred metres and two kilometres from the coast.

ANATIDAE
Swans, Geese and Ducks

(82) **Bar-headed Goose** ***Anser indicus*** (Latham)

Status: Vagrant. **Habitat**: Both occurrences were, surprisingly, in a saline environment. **Sites and sightings:** An apparently sick bird was observed by Holt (1997) in the Chapora estuary on 17th November 1997 and six birds were seen at the Cumbarjua canal in the winter 1999/2000 by Harvey D'Souza (pers. comm.).

(90) **Ruddy Shelduck** ***Tadorna ferruginea*** (Pallas)
(Brahminy Duck)

First recorded on 22nd November 1987 when a single bird was observed resting on tidal mudflats between Divar and Chorao, in the inland estuary of the Mandovi. **Status**: Irregular winter visitor to wetlands of the coastal belt. **Habitat**: Freshwater tanks, ponds, pools and marshes as well as tidal mudflats. **Sites and sightings**: Carambolim lake (5 sightings of up to 47 birds); Agarwaddo marshes (3 sightings of up to 26 birds); Divar-Navelim (2 sightings of up to 9 birds); Divar-Chorao mudflats (one sighting of 13 birds); Shiroda marshes (one sighting of 20 birds) and Ciba-Geigy ponds (one sighting of 2 birds). **Observers**: Frost (pers. comm.), Gregory, Griggs (1996), Holt (2000), van der Wielen (1998) and the author. **Seasonal status**: Of the altogether 12 sightings between 3rd November and 15th February six were made in November, four in December and two in February.

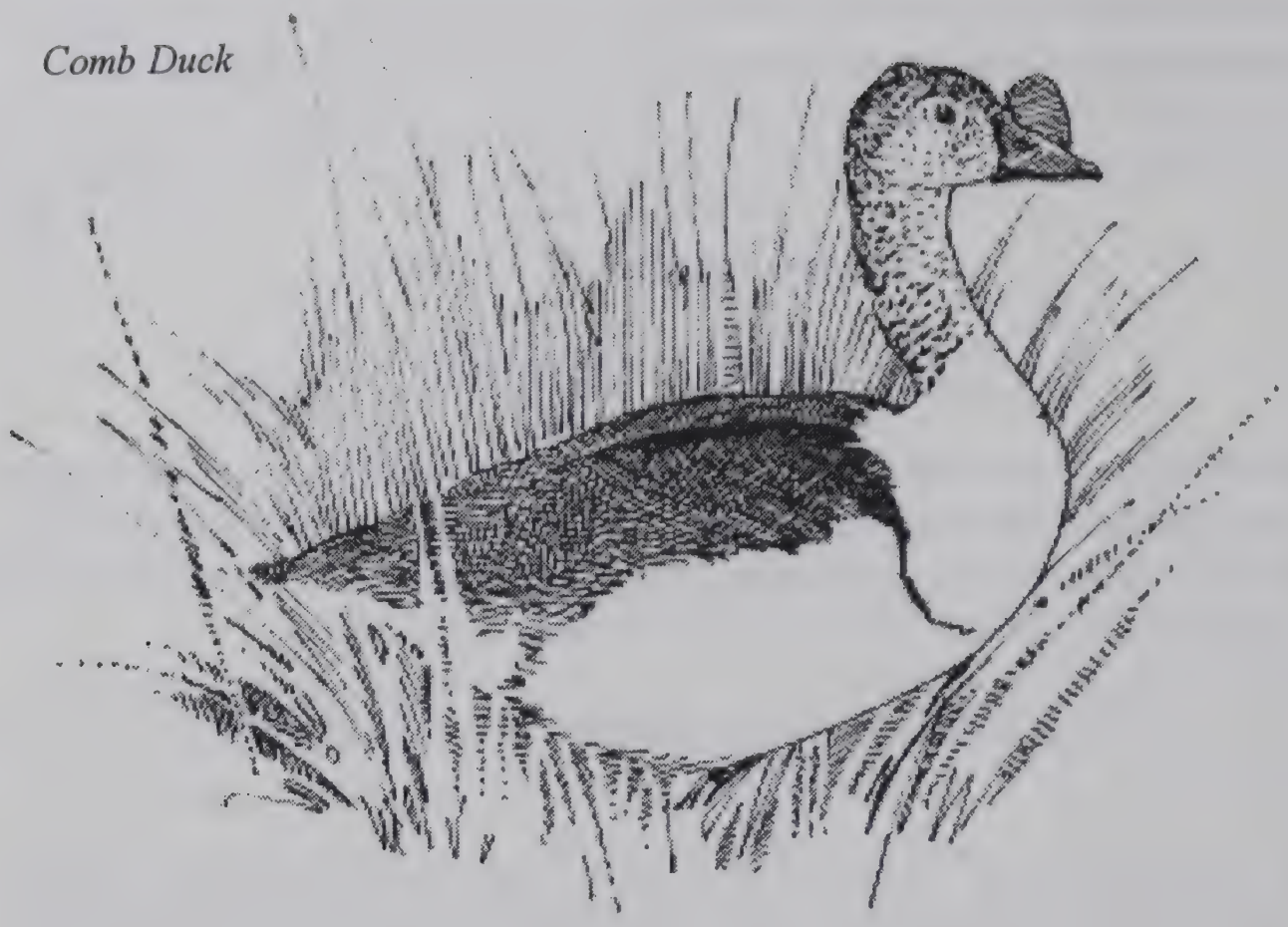
(115) **Comb Duck** ***Sarkidiornis melanotos*** (Pennant)
(Knob-billed Duck, Nakta)

First recorded on 26th December 1988 when over 50 birds were sighted at the Carambolim lake. **Status**: An uncommon but annual winter visitor. **Sites**: Found almost exclusively at the Carambolim lake, only occasionally at the two ponds in the Ciba-Geigy compound and at one of the tanks at Curtorim. **Population**: Annual maximum numbers at Carambolim lake were:

1988	50+	1993	25	1996	11	1999	20
1989	80+	1994	4	1997	15	2000	10
1990	20	1995	10	1998	10	2001	7

Observers: Hill (1997), Frost (pers. comm.), Marsh (1998), Pitt (1995), van der Dol (1998), Vermeulen (2000), Willoughby and the author. **Seasonal status**: Arrival

Comb Duck



takes place variably from late November to late December (earliest record: 19th November), departure lasts from mid-April to mid-May (latest record: 24th May).

(114) **Cotton Pygmy-goose** ***Nettapus coromandelianus*** (Gmelin)

(Cotton Pygmy-Teal, Cotton Teal, Quacky Duck)

First recorded on 26th November 1982 when a single bird was observed on a pond at Velsao. **Status**: A common winter or dry season visitor and scarce summer resident of wetlands throughout the coastal region. **Sites**: Siolim-Marna, Pilerne pond (Bardez); Carambolim lake***, Pilar pond*, Merces tank, Santa Cruz wetlands, Goa Velha, Ciba-Geigy (Tiswadi); Velsao tank (Marmagoa); Benaulim pond, Curtorim tanks**, Utorda, Colva, Chandor, Velim tank, Orlim (Salcete). **Population**: The annual maximum numbers, usually reached in December-January, climbed from 100+ in 1988 to 500+ in 1996, stagnated shortly in 1997-98 and rose steadily to 3030+ in 2002. Since 1998, the highest numbers were consistently counted at the four tanks of Curtorim. **Breeding status**: There is no indication of this duck's breeding anywhere in Goa though the few birds present from April to September are in breeding plumage. **Seasonal status**: These ducks arrive mainly at the end of November, in some years as early as mid-September, and depart during the last days of May and the first days of June, leaving only a handful of individuals to stay on during the southwest monsoon.

(101) **Gadwall *Anas strepera*** Linn.

First recorded on 30th October 1988 when a female bird was spotted on tidal mudflats between the islands of Chorao and Divar, in the inland estuary of the Mandovi. **Status**: An uncommon winter visitor to the coastal belt that was absent only in the year 1998. **Habitat**: Freshwater tanks and marshes, exceptionally tidal mudflats. **Sites**: Carambolim lake (17 sightings), Curtorim tanks (5) and Agarwaddo marshes (1). **Population**: Singles and pairs are the rule, congregations of up to 10 birds not unusual. Maximum numbers observed were 29 birds at a Curtorim tank on 7th February 2002 (Frost, pers. comm.), 25 birds at Carambolim lake on 18th January 2000 (Lassey 2000) and 14 birds at a Curtorim tank on 13th December 2000. **Seasonal status**: The earliest winter visitor was observed on 10th November, the latest on 10th March.

(103) **Eurasian Wigeon *Anas penelope*** Linn.

First recorded on 4th March 1988 when a single drake was observed on tidal mudflats between Divar and Chorao, in the inland estuary of the Mandovi. **Status**: A near-regular winter visitor to wetlands in the coastal belt. **Habitat**: Freshwater tanks, exceptionally tidal mudflats. **Sites**: Carambolim lake (12 sightings), Curtorim tanks (3) and mudflats between Divar and Chorao (1). **Population**: Out of a total of 17 sightings (up to 24th December 2000) 15 were of singles or groups of up to five birds, one was of 6+. The highest number, over 30 birds, was seen by Robson (1999) on 16th November 1999. **Seasonal status**: The earliest sighting was on 27th October, the latest on 4th March.

(100) **Mallard *Anas platyrhynchos*** Linn.

First recorded on 22nd November 1987 when two drakes were sighted on tidal mudflats between Divar and Chorao, in the inland estuary of the Mandovi. **Status**: A scarce and irregular winter visitor to only two sites in the coastal belt. **Habitat**: Apparently only larger freshwater bodies are frequented; exceptionally found in saline environment. **Sites**: This duck has been recorded only at the Carambolim lake and once at the Divar-Chorao mudflats. **Population**: There were 14 records since 1987, the majority of singles and twos. The highest counts were of 27 drakes and an unknown number of ducks on 2nd December 1995 (Frost, pers. comm.) and *ca.*17 birds on 2nd February 1996 (Holt 1996a). This species was not recorded in the years 1988, 1990, 1991, 1997 and 2000. **Seasonal status**: The earliest arrival was on 8th November (Holt 1999), the latest departure on 7th April (Burfield 1998).

(97-9) **Spot-billed Duck *Anas poecilorhyncha*** J. R. Forster

First recorded on 4th March 1988 when two birds were observed on tidal mudflats between Chorao and Divar, in the inland estuary of the Mandovi. **Status**: Apparently a scarce winter visitor and spring passage migrant. Found at water bodies in the

coastal belt. **Habitat**: Freshwater tanks and ponds. Out of 17 sightings only one was in a saline environment. **Sites and sightings**: Carambolim lake (13 sightings), Ciba-Geigy (3), Curtorim tanks (2). **Observers**: Arnold (1997), Djerf (1997), Frost (pers. comm.), Gibson (1998), Holt (1996a, 1997), Lassey (2000), Luoto (2000), Senior (1997), Todd (2000), Willoughby (1993) and the author. **Population**: The majority of the 17 sightings are of two birds (8) and singles (3). The highest numbers were recorded at Carambolim: 12 birds on 10th March 1993 (Willoughby 1993) and five birds on 22nd February 1998 (Gibson 1998). **Seasonal status**: Winter visitors were present between 13th November and 10th March. A short spring passage of single drakes was observed during the first half of May 1999 and 2002.

(105) **Northern Shoveller *Anas clypeata*** Linn.

(Shoveller)

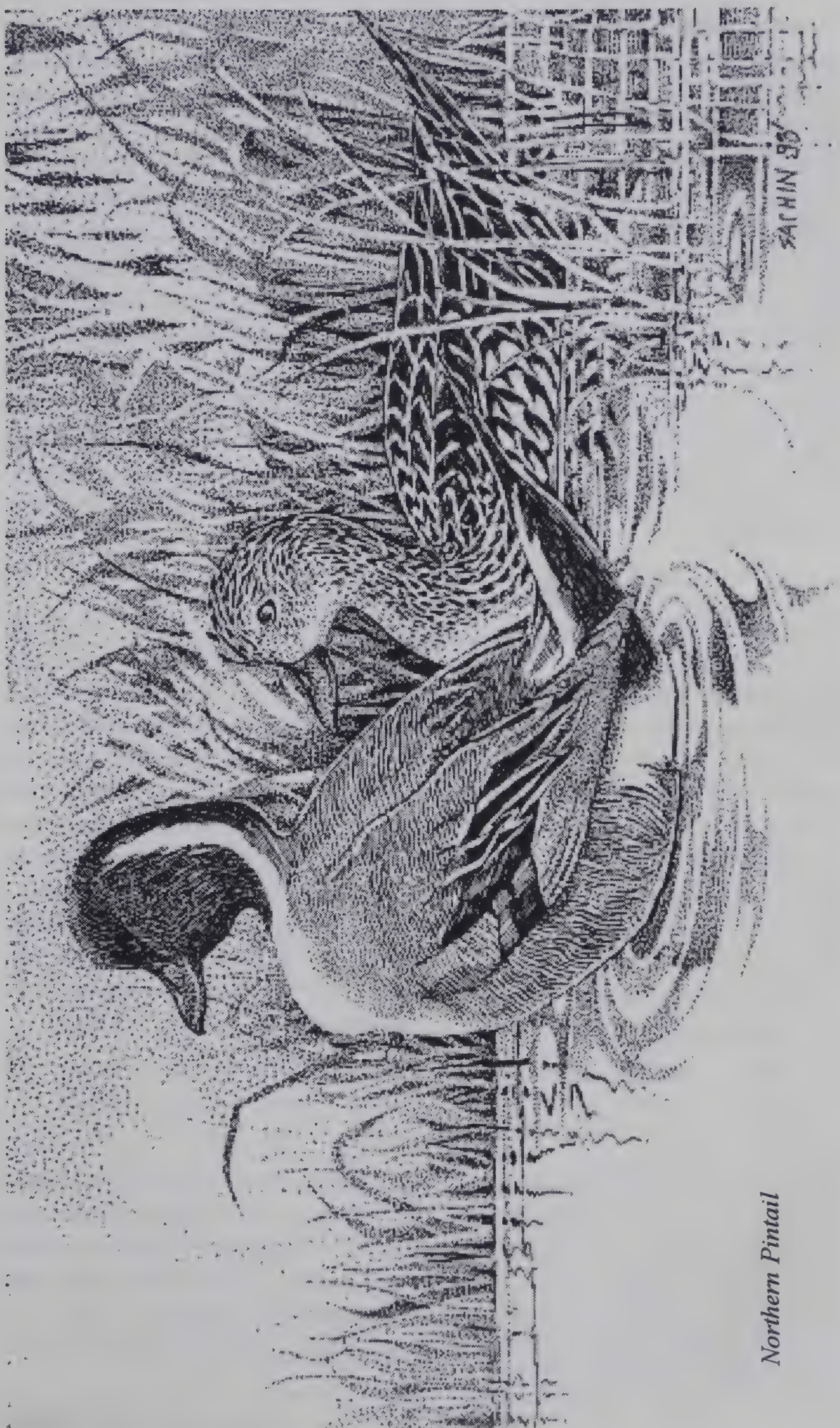
First recorded on 4th March 1988 when a drake and four ducks were seen on the mudflats between Divar and Chorao, in the inland estuary of the Mandovi. **Status**: An uncommon but regular winter or dry season visitor to the coastal belt. **Habitat**: Freshwater wetlands and tanks, occasionally estuaries. **Sites**: Parshem-Agarwaddo marshes, estuary of the Chapora river (Pernem); Carambolim lake, Mandovi between Chorao and Divar, Pilar pond, Batim tank, Merces, Goa Velha (Tiswadi); Maem Todi (Salcete). **Population**: Sightings of single-digit numbers are the rule. The maximum numbers were 31 birds on the Carambolim lake, on 9th November 1997. **Seasonal status**: The earliest birds were seen passing over the Chapora estuary on 26th September and the latest at Carambolim lake on 2nd May.

(93) **Northern Pintail *Anas acuta* Linn.**

(Pintail)

First recorded on 26th January 1985 when flocks totalling 3000+ birds were sighted over the Agarwaddo marshes. **Status**: By far the commonest wintering duck in Goa, the Northern Pintail is often an abundant winter visitor to wetlands in the coastal belt. **Habitat**: Freshwater tanks are favoured but in years of an extremely high wintering population huge flocks can be encountered in freshwater, brackish and even fully saline marshes. **Sites**: Paliyem marsh, estuary of the Chapora river, Parshem-Agarwaddo marshes (Pernem); Sinquerim creek (Bardez); Carambolim lake***, Chorao, Ciba-Geigy (Tiswadi); Curtorim tanks, Maem Todi (Salcete). During incoming migration in October and the first half of November, sizeable flocks of apparently just arrived birds can be seen flying all over the coastal belt, apparently in search of suitable wetlands. **Population**: Annual maximum numbers at Divar – Chorao mudflats (1985–1990) and Carambolim lake (1991–2000) were

1985	20 000+	1988	70 000+	1991	35 000+	1997	~1500
1986	30 000+	1989	40 000+	1995	~5000	1998	~4000
1987	25 000+	1990	40 000+	1996	25 000+	1999	3500+
						2000	5000+



Northern Pintail

Seasonal status: The bulk of pintails arrive during the first week of October (earliest record: 16th September) while departure takes place during the second half of March. One or two drakes occasionally linger right up to the southwest monsoon, e.g. one until 4th June 1996, at Ciba-Geigy. **Remarks**: The estimated 70 000+ pintails, that were present at the Divar-Chorao tidal mudflats and the Carambolim lake for a couple of weeks in January 1988, were the largest single number recorded at any wetland in the area covered by the annual Asian Mid-winter Waterfowl Count for that year (Daniel 1988). Apparently, the drought conditions prevailing in northern India had forced the birds further south into the peninsula, where wetlands were filled by a more than sufficient monsoon. Even this vast number pales in comparison with the conservatively estimated 120 000 Northern Pintails seen on 9th January 2002 by Frost and the author in and over the inland estuary of the Mandovi. While at least 50 000 birds rested for about an hour on tidal mudflats between the riverine islands of Chorao and Divar up to five flocks of 10-20 000 birds each were circling *ca.* 200 metres overhead, before disappearing in a southerly direction.

(104) **Garganey *Anas querquedula*** Linn.

(Blue-winged Teal)

First recorded on 3rd February 1985 when 250+ birds were observed on the tidal mudflats between Divar and Chorao. **Status**: A fairly common, locally abundant winter or dry season visitor. There is a wide scattering of sightings throughout the coastal belt and, occasionally, during inward migration, even offshore. **Habitat**: All kinds of freshwater, brackish and saline wetlands are frequented though freshwater is preferred. **Sites**: Parshem-Agarwaddo marshes, estuaries of the Terakol and Chapora rivers (Pernem); Baga creek (Bardez); Carambolim lake***, Goa Velha, estuary of the Zuari at Agassaim, mudflats in the Mandovi between Chorao and Divar, Merces tank, Santa Cruz creek, Ciba-Geigy, Pilar pond, Neura wetlands (Tiswadi); Shiroda marshes* (Ponda); Chandor wetlands, Curtorim tanks** (Salcete). **Population**: Annual maximum numbers at Divar-Chorao mudflats and Carambolim lake were

1986	3000+	1989	4000+	1993	~1000	1997	5000+
1987	~2500	1990	4000+	1995	~3000	1998	~2000
1988	500+	1991	8000+	1996	~3000	1999	2200+

Maximum numbers at other wetlands with a regular, sizeable wintering population: Curtorim (up to 300+); Shiroda (up to 2000+); Parshem-Agarwaddo (up to ca. 50); Merces-Santa Cruz (up to 100+); Pilar (up to 200+). **Seasonal status**: The second half of September sees the first influx (earliest record: 15th September). The main body arrives in October. Maximum numbers are reached in December-January. Departure begins towards the end of April. Frequently, a few birds stay right into June (latest record: 27th June).

(94) **Common Teal** ***Anas crecca*** Linn.

First recorded on 30th October 1988 when at least one bird was present on the tidal mudflats between Divar and Chorao. **Status**: An uncommon, in some years fairly common winter visitor to a few freshwater wetlands in the coastal belt and, rarely, to estuaries. **Habitat:** Mainly freshwater tanks but also brackish marshes, tidal mudflats and estuaries. **Sites**: Estuary of the Chapora river, Parshem-Agarwaddo marshes (Pernem); mudflats between Divar and Chorao, Santa Cruz creek, Batim tank, Neura wetlands, Carambolim lake*** (Tiswadi); Curtorim tanks**, Velim tank (Salcete). **Population**: At most wetlands, this duck is usually found in single-digit numbers. The highest numbers, 2-300 birds, were seen at Carambolim in November 1997 (Holt 1997), followed by 100+ birds in January 2001 (Frost, author), *ca.* 70 at the Batim tank (Frost, pers. comm.) and 52 birds at Parxem-Agarwaddo. **Seasonal status**: The first birds trickle in during the first half of November (earliest: 30th October). Outward migration lasts through March (latest: 6th April).

(108) **Common Pochard** ***Aythya ferina*** (Linn.)

First recorded on 22nd November 1987 when a single drake was seen on Divar island. **Status**: A rare winter visitor of wetlands and estuaries and a rare passage migrant over offshore waters. **Habitat**: Larger freshwater tanks and, exceptionally, tidal mudflats. **Sites**: Carambolim lake; tidal mudflats in the Mandovi river between Chorao and Divar; open sea off the Anjuna-Chapora coast (presumably on migration). **Population**: There are a total of 14 sightings during 14 years, from 1987 to 2000. The maximum numbers were eight birds off the Anjuna-Chapora coast, on 10th November 1995 (Addey 1995), and two males and four females at Carambolim lake, on 15th January 1989. **Seasonal status**: The earliest bird was a female on the Chorao-Divar mudflats, on 30th October 1988, the latest were three birds on Carambolim lake, on 13th February 1998 (Holt 1998a).

(109) **Ferruginous Pochard** ***Aythya nyroca*** (Guldenstadt)

(White-eyed Pochard, Ferruginous Duck)

First recorded on 27th November 1987 when a female settled shortly on the waters of the Chapora estuary. **Status**: A scarce winter visitor to wetlands in the coastal belt and river basins. **Habitat**: Freshwater tanks and, exceptionally, saline river estuaries. **Sites**: Carambolim lake and Batim tank, Chapora estuary. **Population**: There are a total of 19 sightings during 13 years, from 1987 to 1999. The maximum number is three birds, on 13th January 1996 and 20th February 1997 (Willoughby 1997), both on Carambolim lake. **Seasonal status**: Two male birds were the earliest to turn up on Carambolim lake, on 27th October 1996. The latest occurrence was of three birds on Carambolim lake, on 20th February 1997 (Willoughby 1997).

(111) **Tufted Duck** ***Aythya fuligula*** (Linn.)

First recorded on 22nd November 1987 when two females were observed by the author (1999a) on the tidal mudflats between Divar and Chorao in the inland estuary of the Mandovi. **Status**: A very rare winter visitor to wetlands in the coastal belt. **Habitat**: Larger freshwater tanks, tidal mudflats and creeks. **Sites and Sightings**: A single drake was recorded by Holt (1996a) on Carambolim lake, on 11th January 1996, a duck by Carl d'Silva and the author at the Velim tank, on 24th January 1999, and a drake was seen passing over the Santa Cruz creek, on 3rd December 2000 by Frost and the author.

TURNICIDAE
Buttonquails

(313) **Small Buttonquail** ***Turnix sylvatica*** (Desfontaines)
(Little Bustard-Quail)

Status: Uncertain. This very secretive bird is probably often overlooked. **Sighting**: On 9th December 1998, Frost (pers. comm.) observed a single bird foraging under bushes scattered over the grassy, lateritic plateau between the villages of Arpora, Parra and Verla-Canca, just 2-3 kilometers from the coast.

(316-9) **Barred Buttonquail** ***Turnix suscitator*** (Gmelin)
(Common Bustard Quail, Blue-legged Bustard Quail, Northern Bustard-Quail)

First reported by Grubh and Ali (1976), who noted it at 'various localities' during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A scarce, easily overlooked but fairly widespread resident of the coastal belt and the midland zone up to the base and foothills of the Western Ghats. **Habitat**: Scrub covered hillsides, plateaus and ridges; degraded, secondary and moist deciduous forest. **Sites**: Terakol, Arambol, Morjim (Pernem); Nagoa valley and hill, Baga hill, Sinquerim plateau (Bardez); Dona Paula (Tiswadi); Bhagwan Mahavir WS, Mollem (Sanguem); Cotigao WS** (Canacona). **Breeding status**: A probable breeder, but no proof exists. **Seasonal status**: Recorded in all months except in June and August. This buttonquail might be partially nomadic during the southwest monsoon.

PICIDAE
Wrynecks, Piculets and Woodpeckers

(796) **Eurasian Wryneck *Jynx torquilla*** Linn.
(Wryneck)

First reported by the author (1999b), who observed a single bird on 13th November 1986 in the Nagoa valley. **Status**: A casual winter visitor to the coastal belt. **Habitat**: Open woodland; hedgerows between saltpans and paddy-fields; lightly wooded pastures; patches of remnant semi-evergreen forest on the slope of coastal plateaus. **Sites**: Nagoa valley, Baga fields, Saligao spring (Bardez); Mobor (Salcete). **Population**: There are 10 sightings of singles and one of two birds, between 1986 and 2000. **Seasonal status**: The earliest arrivals were on 13th November 1986 in the Nagoa valley and on 13th November 1999 (Holt 1999) in the Baga fields, the latest sighting was on 13th March 1997 at the Saligao spring (Djerf 1997).

(798-9) **Speckled Piculet *Picumnus innominatus*** Burton

First reported by Pitt (1995), who saw a single bird in the Bondla WS, on 10th January 1994. **Status**: A scarce resident (?) or visitor in all seasons at the base of the Western Ghats, up to *ca.* 250 metres. **Habitat**: Moist deciduous and semi-evergreen forest with areas of bamboo. Encountered most frequently in mid-canopy where this unobtrusive bird is easily overlooked, except when noisily working on bamboo. **Sites**: Bondla WS***, Backwoods Camp**, Bhagwan Mahavir WS, Cotigao WS*. **Population**: There are 22 sightings of singles, three of two birds and one of three. Often joins mixed species feeding flocks. **Seasonal status**: Recorded in the months of January, February, April, May, August, November and December.

(851-4) **Brown-capped Pygmy Woodpecker *Dendrocopus nanus*** (Vigors)
(Brown-capped Woodpecker, Brown-crowned Pygmy Woodpecker, *Picoides nanus, Dendrocopus moluccensis*)

First reported by Saha and Dasgupta (1992), who collected a specimen at Mollem/ Collem on 4th January 1969, during one of their collecting trips to Goa for the Zoological Survey of India. **Status**: A locally fairly common resident in the foothills of the Western Ghats and a casual visitor to patches of remnant semi-evergreen forest on the slope of plateaus bordering the coastal belt. **Habitat**: Restricted to moist deciduous and semi-evergreen forest up to *ca.* 150 metres. **Sites**: Nagoa valley (Bardez); Valpoi (Sattari); Bondla WS** (Ponda); Bhagwan Mahavir WS***, Mollem, Collem (Sanguem); Cotigao WS* (Canacona). **Population**: Sightings of singles and two birds appear to be the rule. At least four individuals were seen along a 2-3 kilometres stretch of road in the Bondla WS (Frost, pers. comm.). **Breeding status**:

Though this woodpecker was recorded in all months there is still no proof of its breeding. **Seasonal status**: Recorded throughout the year without any noticeable seasonal movements.

(847) **Yellow-crowned Woodpecker** ***Dendrocopus mahrattensis*** (Latham)

(Yellow-fronted Pied Woodpecker, Mahratta Woodpecker, Yellow-crowned Pied Woodpecker, *Picoides* mahrattensis)

First reported by Saha and Dasgupta (1992) who collected a female of the nominate race near Ponda, on 18th March 1973, during one of their many collecting trips to Goa for the Zoological Survey of India. **Status**: An uncommon and unobtrusive, patchily distributed resident and probable breeder in only a few localities of the coastal and midland regions as well as on the lower slopes of the Western Ghats. **Habitat**: Remnant woodlands on the scarp of plateaus and ridges; moist deciduous, semi-evergreen and evergreen forest. **Distribution**: Not yet recorded in South Goa. **Sites**: Nagoa valley**, Baga (Bardez); Mayem lake (Bicholim); Talaulim-Santana (Tiswadi); Bondla WS (Ponda); Bhagwan Mahavir WS* (Sanguem). **Breeding status**: A pair was observed inspecting nest-holes in the Nagoa valley, on 12th May 1998. **Seasonal status**: Recorded in all months except June. No seasonal movements are discernible.

(802-4) **Rufous Woodpecker** ***Celeus brachyurus*** (Vieillot)

(Brown Woodpecker, *Micropternus brachyurus*)

First reported by Grubh and Ali (1976) who collected a specimen at Mollem and observed it in the Cotigao WS during their ornithological survey of Goa from 27th November to 12th December 1972. The specimen was listed as *M. b. jerdonii*. **Status**: A fairly common and widespread resident in the coastal and midland regions as well as on the lower slopes of the Western Ghats. **Habitat**: Found in a wide variety of woodlands like well-wooded villages, mango topes, patches of remnant semi-evergreen forest in valleys on the slope of plateaus and semi-evergreen and evergreen forest. **Breeding status**: Breeding is very likely but not yet recorded. **Seasonal status**: Recorded in all months without any discernible nomadic movements.

(830) **White-bellied Woodpecker** ***Dryocopus javensis*** (Horsfield)

(White-bellied Black Woodpecker, Indian Great Black Woodpecker)

First reported by Grubh and Ali (1976), who noted it in the Bhagwan Mahavir WS and Cotigao WS during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: An often vociferous, but still easily overlooked, scarce breeding resident of the base and crest of the Western Ghats. **Habitat**: Primary moist deciduous, mixed bamboo, semi-evergreen and, occasionally, dense evergreen for-

est. **Sites**: Bhagwan Mahaveer WS; Cotigao WS. **Breeding status**: Breeding was observed on 27th January 2003 at an altitude of *ca.* 580 metres, near the top of the Dudhsagar waterfalls. **Seasonal status**: Not yet recorded in April, May, August, September and October. **Remarks**: Although the range of the White-bellied Woodpecker extends as far north as northern Maharashtra and the Surat Dangs of Gujarat (Santharam 1995), *ca.* 600 kilometres to the North of Goa, the species is probably close to extirpation in both of these states (See Grimmett *et al.* 1998 for a suggestion that it might already be absent from Maharashtra). Goa would then lie at the northern limit of the species' shrinking range (Holt *in litt.* 2000). Santharam (*in litt.* 2003), who did a survey of the White-bellied Woodpecker in the entire Western Ghats, asserts that this species is 'extirpated in the Western Ghats of Maharashtra [but] not in Maharashtra as such.'

(814-7) **Lesser Yellownape *Picus chlorolophus*** Vieillot

(Lesser Yellow-naped Woodpecker, Small Yellow-naped Woodpecker)

First reported by Rane (1983) who observed it at the Dudhsagar waterfalls during one of his Goa trips from 18th – 24th May 1981, 6th – 10th April and 16th – 22nd June 1982. **Status**: A very scarce resident from the base to the crest of the Western Ghats **Habitat**: Moist deciduous, semi-evergreen and dense evergreen forest, dense *shola*-like woods on the crest of the Ghats. Apparently prefers the vicinity of rivers and streams. **Sites**: Surla (Sattari); Bondla WS; Bhagwan Mahavir WS. **Population**: There are a total of only 20 sightings, all of single birds, in 19 years, from 1982 to 2000. **Seasonal status**: Seen in all months except August through November.

(825-6) **Common Flameback *Dinopium javanense*** (Ljungh)

(Common Goldenback, Indian Goldenback, Indian Golden-backed Three-toed Woodpecker)

First recorded in the Bhagwan Mahavir WS on 12th July 1984. **Status**: An uncommon, locally fairly common resident of the Western Ghats, foothills and crest; not found on the scarp. **Habitat**: Moist deciduous, semi-evergreen and dense wet evergreen forest, especially in the neighbourhood of rivers and streams. **Sites**: Bondla WS*; Bhagwan Mahavir WS***; Cotigao WS**. **Population**: Usually seen in twos and threes, also in mixed species feeding flocks. **Seasonal status**: Not yet recorded in January, April, August, September and October.

(818-23) **Black-rumped Flameback *Dinopium benghalense*** (Linn.)

(Black-rumped Goldenback, Lesser Goldenback, Lesser Golden-backed Woodpecker)

First reported by Saha and Dasgupta (1992), who collected 8 specimens at various places, between December 1968 and February 1978, all of which they ascribed to

the sub-species *D. b. tehminae*. A male specimen collected by Grubh and Ali (1976) at Canacona in November/December 1972 was tentatively assigned to *D. b. puncticolle*. **Status**: A common, conspicuous and widely distributed breeding resident that ranges from the seashore to the upper slopes (up to 425 metres) of the Western Ghats and occurs again, after a gap of a couple of hundred altitude metres, on the crest. It is almost evenly distributed over the entire state. **Habitat**: Undiscerning and catholic in its habitat preferences, though a favourite seem to be groves of coconut palms. Found in deciduous and moist deciduous (primary and secondary), semi-evergreen and not too dense evergreen forest; in and around villages, mango orchards, trees lining saline creeks, etc. **Breeding status**: Occupied nest holes (in coconut palms) were noted in April and December. **Seasonal status**: Recorded throughout the year in unvarying numbers. **Remarks**: In forests at the base of the Western Ghats (e.g. Cotigao WS), this species is occasionally seen associated with the Greater Flameback *Chrysocolaptes lucidus*.

(860-3) **Greater Flameback *Chrysocolaptes lucidus*** (Scopoli)

(Greater Goldenback, Larger Golden-backed Woodpecker)

First recorded by Grubh and Ali (1976), who collected it at Valpoi during their ornithological survey of Goa from 27th November to 12th December 1972. The specimen was tentatively assigned to the subspecies *C. l. chersonesus*. The three specimens collected by Saha and Dasgupta (1992) between 1973 and 1978 at Valpoi-Pendral and in the Bhagwan Mahavir WS and Cotigao WS were identified by them as definitely belonging to *C. l. chersonesus*. **Status**: An uncommon, locally fairly common, probably breeding resident of outlying isolated foothills, the base and lower slopes (up to *ca.* 250 metres) and the crest of the Western Ghats. **Habitat**: Moist deciduous, semi-evergreen and not too dense evergreen forests. One Greater Flameback was observed on tall trees in the centre of Collem village, in March 1987. **Sites**: Bondla WS (Ponda); Bhagwan Mahavir WS, top of Dudhsagar falls, Tambdi Surla, Collem (Sanguem); (Sanguem); Cotigao WS (Canacona). **Population**: This woodpecker is often encountered in groups of three to 10 birds, frequently in mixed species feeding flocks. **Breeding status**: Chiselling of a nest-hole was noted at the Bondla WS between 3rd and 23rd January 2001 (Frost, pers. comm.) **Seasonal status**: Recorded throughout the year with unchanging frequency.

(856) **Heart-spotted Woodpecker *Hemicircus canente*** (Lesson)

First reported by Saha and Dasgupta (1992), who, between 1969 and 79, collected three specimens in the Bhagwan Mahavir WS during their collecting trips for the Zoological Survey of India. They ascribed all the specimens to the nominate race. **Status**: This highly vocal and reasonably conspicuous species is an uncommon, locally fairly common resident throughout the Western Ghats, from foothills to the crest. **Habitat**: Usually seen in moist deciduous, semi-evergreen and fairly dense

wet evergreen forest, occasionally in outlying cashew plantations. **Sites**: Valpoi (Sattari); Bondla WS (Ponda); Mollem, Collem, Bhagwan Mahaveer WS (Sanguem); Cotigao WS (Canacona). **Population**: This woodpecker is only occasionally found in roving mixed species feeding flocks. The highest count was 10+ birds along the *ca.* three kilometres of forest track from the Hedumol checkpost to Bela, in the Cotigao WS. **Seasonal status**: Recorded in all months with unchanging frequency.

MEGALAIMIDAE
Asian Barbets

(780-2) **Brown-headed Barbet** ***Megalaima zeylanica*** (Gmelin)
(Green Barbet)

First reported by Saha and Dasgupta (1992), who collected a pair of the subspecies *M. z. inornata* in the Cotigao WS on 26th December 1968, during one of their collecting trips for the Zoological Survey of India. **Status**: This Indian subcontinent endemic is a scarce breeding resident that is unevenly distributed throughout the state but found mainly at the base, lower slopes and the crest of the Western Ghats. **Habitat**: Well-wooded villages, orchards of fruit-trees, patches of remnant semi-evergreen woodland on the scarp of plateaus in the coastal and midland region and moist deciduous, semi-evergreen and wet evergreen forest in the Ghats strip. **Sites**: Terakol (Pernem); Saligao spring, Nagoa valley, Anjuna (Bardez); Valpoi (Sattari); Bondla WS, Savoi-Verem (Ponda); Sancoale, Issorcim (Marmagoa); Bhagwan Mahavir WS, Mollem, Collem, Backwoods Camp (Sanguem); Cotigao WS (Canacona). **Breeding status**: Fully-fledged youngsters were observed in the Cotigao WS on 16th May 2001. **Seasonal status**: Recorded in all months except September and October. No marked fluctuations in numbers were observed. **Remarks**: Easily overlooked as the song – an incessantly repeated, monotonous 'kutock...kutock...' – is very similar to, but slightly lower pitched, than that of the abundant White-cheeked Barbet *Megalaima viridis* (Holt *in litt.* 2000).

(785) **White-cheeked Barbet** ***Megalaima viridis*** (Boddaert)
(Small Green Barbet)

First recorded by Grubh and Ali (1976), who collected a specimen at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: This Western Ghats endemic is an abundant breeding resident throughout the state, from the seaside to the crest of the Ghats. **Habitat**: Coastal palm groves, open country with a scattering of trees, wooded gardens, roadside avenues and all types of woodland and forest. **Breeding status**: The chiselling of nest holes was observed at the Baga creek on 31st January 1996, and in the Nagoa valley on 13th March 1998. A fledgling was seen at Arpora on 15th March 2002 (Frost, pers. comm.).

Seasonal status: Recorded throughout the year in hardly varying numbers. **Remarks**: This barbet is frequently a member of mixed species feeding flocks in the forests of the Western Ghats.

(790-1) **Crimson-fronted Barbet** ***Megalaima rubricapilla*** (Gmelin)

(Crimson-throated Barbet)

First reported by Saha and Dasgupta (1992), who collected a pair of the subspecies *M. r. malabarica* in the Cotigao WS, on 25th December 1968, during one of their collecting trips for the Zoological Survey of India. **Status**: This endemic to the Western Ghats and Sri Lanka is a fairly common to locally common breeding resident of a restricted and narrow belt between the eastern rim of the midland region and the slope of the Ghats up to *ca*. 400 metres. **Habitat**: Moist deciduous, semi-evergreen and evergreen forest. **Sites**: Valpoi (Sattari); Bondla WS, Savoi-Verem (Ponda); Kalay, Mollem, Collem, Bhagwan Mahavir WS (Sanguem); Cotigao WS (Canacona). **Population**: Up to 6+ birds were seen in a single fruiting tree. **Breeding status**: Incubation was observed at the Cotigao WS on 29th December 1999. **Seasonal status**: Recorded in all months except June. Numbers do not show any

Coppersmith Barbet

significant fluctuations. **Remarks**: The ranges of the Crimson-fronted Barbet and the Coppersmith Barbet overlap on the slope of the Western Ghats up to 150 metres where they are often seen feeding in the same tree and calling side by side.

(792) **Coppersmith Barbet *Megalaima haemacephala*** (P. L. S. Mueller)

(Crimson-breasted Barbet, Coppersmith)

First reported by Saha and Dasgupta (1992), who collected two specimens in the Cotigao WS on 28th March 1973, during one of their collecting trips for the Zoological Survey of India. They ascribed them to the subspecies *M. h. indica*. **Status**: A common breeding resident from the coast through the midland region to the lower slopes of the Western Ghats, up to *ca*. 150 metres. **Habitat**: Open wooded areas including village groves and wooded compounds, patches of remnant semi-evergreen woodland on the slope of coastal and midland plateaus, secondary, deciduous, moist deciduous and semi-evergreen forest. **Breeding status**: Nest-building was observed in the Bhagwan Mahavir WS on 22nd November 1985, incubation in the Nagoa valley on 8th January 1985 and the feeding of a youngster on 11th February 1982. **Seasonal status**: Recorded throughout the year without noticeable fluctuations of the population. **Remarks**: This barbet is largely silent and inconspicuous between early May and the first days of December.

BUCEROTIDAE
Hornbills

(768) **Malabar Grey Hornbill *Ocyceros griseus*** (Latham)

(*Tockus griseus*)

First reported by Saha and Dasgupta (1992), who collected 11 specimens (!!), all of the nominate race, at various places in Goa, during their collection trips for the Zoological Survey of India between 1968 and 1978. **Status**: By far the most regularly encountered of Goa's three species of hornbill, this Western Ghats endemic is an often conspicuous, locally fairly common breeding resident that is restricted to the Ghats and their outlying hillocks, from the base to the crest. **Habitat**: Moist deciduous, semi-evergreen and, occasionally, dense wet evergreen forest. The only instance of a Malabar Grey Hornbill straying from its narrowly restricted habitat was a record at the coastal village of Terakol, on 11th September 1985. **Sites**: Terakol (Pernem); Surla, Sattrem (Sattari); Bondla WS (Ponda); Kalay, Sancordem, Neturlim, Collem, Backwoods Camp, Bhagwan Mahavir WS (Sanguem); Sidhanath hill (Quepem); Cotigao WS (Canacona). **Population**: Flocks of up to 15 birds are not a rare sight. 35+ birds were observed in a single fruit-bearing tree along the track from the Hedumol checkpost to Bela, in the Cotigao WS, on 25th December 1998.

Breeding status: Incubation was observed on 19th May 2002 in the Bondla WS by Harvey D'Souza (pers. comm.) **Seasonal status**: Recorded in all months without marked fluctuations in numbers.

(775) **Malabar Pied Hornbill** ***Anthracoceros coronatus*** (Boddaert)

First reported by Grubh and Ali (1976), who collected a specimen of the nominate race at the Bhagwan Mahavir WS and observed it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: This Indian subcontinent endemic is an uncommon, locally fairly common resident of the eastern part of the midland region, the entire Western Ghats strip, from the base to the crest, and a few plateaus and ridges facing the coastal belt. The species is also apparently an irruptive or dispersive migrant elsewhere in Goa and there is a wide scattering of records from the coastal belt. **Habitat**: Mainly remnant and contiguous semi-evergreen forest and, to a much lesser degree, scrub and bush covered plateaus with a scattering of large trees. Roving birds are not infrequently found in well-wooded villages. **Sites**: Terakol (Pernem); Anjuna, Oxel, Nagoa valley, Baga hill, Saligao spring (Bardez); Mayem (Bicholim); Anjunem, Surla, Sattrem (Sattari); Carambolim, Corlim (Tiswadi); Bondla WS (Ponda), Mollem, Collem, Backwoods Camp, Bhagwan Mahavir WS, Selaulim (Sanguem); Cotigao WS, Maxem (Canacona). **Seasonal status**: Recorded in all months. Ten of the thirteen records from the coastal belt, apparently of roving birds, date from the months of June, July and August.

(776) **Great Hornbill** ***Buceros bicornis*** Linn.
(Giant Hornbill, Great Pied Hornbill)

First reported by Grubh and Ali (1976), who observed the species in the Bhagwan Mahavir WS, and also noted a party of three birds in the Cotigao WS during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A nervous and wary species whose status in Goa is uncertain, though it can probably be considered a rare resident of the Western Ghats strip, from the base to the crest. **Habitat**: Primary moist deciduous, semi-evergreen and wet evergreen forest. Occasionally, this species strays into secondary forest. **Sites**: Terakol (Pernem); between Golaulim and Surla (Sattari); Durgini, Backwoods Camp, Golcornem, top and bottom of Dudhsagar waterfalls***, Dudhsagar track, Sonaulim, Devil's Canyon**, Tambdi Surla in the Bhagwan Mahavir WS (Sanguem); Watchtower, between Hedumol checkpost and Bela, between Marlem and Tirval in the Cotigao WS* (Canacona). **Observers**: Beevers (1999), Carthy (1998), van der Dol (2000), Frost (pers. comm.), Lassey (1999), Manville (pers. comm.), Prasad (1996), Sykes (1999), Vermeulen (2000), Wilson (1997) and the author. **Population**: Probably not more than 3-6 Great Hornbills are present in Goa at any given time. Singles are encountered most frequently (10 sightings), followed by pairs or twos (7) and threes (2).

Groups of four, five and six birds were seen once each. **Seasonal status**: Not yet recorded in the months of May, June, August, September and October. **Remarks**: The monsoon record of six Great Hornbills at the coastal village of Terakol is undoubtedly exceptional. They were perched for a minute or so in the single large casuarina tree in front of the fort, less than a hundred metres from the mouth of the Terakol river. During the southwest monsoon, this village seems to exert a strange attraction to hornbills, as the September record of a Malabar Grey Hornbill and the three June-July records of Malabar Pied Hornbills show.

UPUPIDAE
Hoopoes

(763-6) **Common Hoopoe *Upupa epops*** Linn.
(Eurasian Hoopoe, Hoopoe)

First reported by Saha and Dasgupta (1992), who collected a specimen of the nominate race between Collem and Mollem on 31st December 1968, during one of their collecting trips to Goa for the Zoological Survey of India. **Status**: A widespread winter visitor from the coast (including offshore islands during migration) to the base and middle slopes of the Western Ghats, up to 250 metres. Fairly common in the coastal belt, scarcer inland. **Habitat**: Generally found in open country, specially in areas of dry, harvested fields and abandoned cultivation, also grassy clearings in forest, grassy lateritic plateaus, railway embankments etc. **Unusual sites**: Navy Island off Bogmalo; on the seawall of the Chapora estuary at Gudem; Dudhsagar railway station (altitude 252 metres); forest clearings at Nandan (Bhagwan Mahavir WS) and Tirval (Cotigao WS). **Population**: Exceptionally high numbers were 22+ birds on 25th December 1999 (Wadsworth 1999) and 21 birds on 29th November 1999 (Dennis 1999), in the Baga fields **Seasonal status**: Winter visitors arrive from mid-September through October (earliest record: 13th September) and depart throughout March and April (latest record: 23rd April).

TROGONIDAE
Trogons

(710-2) **Malabar Trogon *Harpactes fasciatus*** (Pennant)

First reported by Saha and Dasgupta (1992), who collected it in the Bhagwan Mahavir WS on 31st December 1968, during one of their collecting trips for the Zoological Survey of India. The specimen was identified as of the subspecies *H. f. malabaricus*. **Status**: This unobtrusive and typically lethargic species, a subcontinent endemic, is an uncommon, locally fairly common breeding resident of the

Western Ghats, where it is almost evenly distributed from the base to the crest. **Habitat**: The Malabar Trogon never strays from its habitat of moist deciduous, semi-evergreen and not too dense wet evergreen forest. **Sites**: Bondla WS***, Bhagwan Mahavir WS*, Cotigao WS**. **Breeding status**: A female was observed feeding a just fledged youngster near Marlem in the Cotigao WS on 24th December 1999. **Seasonal status**: Recorded in all months with near unvarying frequency and in unchanging numbers.

CORACIIDAE
Rollers

(754) **European Roller** ***Coracias garrulus*** Linn.
(Kashmir Roller)

First reported by Grubh and Ali (1976), who collected a specimen (an immature male) in Canacona on 7th December 1972. The specimen was identified as *C. g. semenowi*. **Status**: Until recently, this species was a vagrant to the southern Indian peninsula and Goa, the southernmost record in India being one by Davidson (1898) from Majali in North Kanara (Karnataka), just a few kilometres south of Goa. The only other record was of a European Roller killed in a collision with a military aircraft, 30 nautical miles off the Goa coast, in October 1987 (Satheesan 1988). Sometime between 1993 and 1996, this species apparently changed its migratory pattern and turned into an almost regular, locally fairly common autumn passage migrant that is found throughout the coastal belt and, exceptionally, at the foot of the Western Ghats. There have also been sightings from many areas of the southern peninsula. **Habitat**: Dry wasteland, pastures, abandoned cultivation and stubble fields. Invariably perched on power lines. **Sites**: Arambol (Pernem); Baga, Anjuna, Arpora-Nagoa, Parra, Verla-Canca, Saligao, Candolim, Fort Aguada (Bardez); Carambolim, Kadamba plateau, St. Cruz, Chorao and Divar islands (Tiswadi); ZAC reservoir (Marmagoa); Mollem-Collem grasslands (Sanguem); Cabo de Rama, Agonda, Chauri (Canacona). **Population**: In some years, this species easily outnumbers the Indian Roller that arrives in its winter quarters at about the same time. The highest numbers recorded at a single site were 11 birds in the Baga fields, on 5th November 1999 (Holt 1999). Along a ca. 10 kilometres long stretch of road (Baga to Mapusa) up to 13 birds were counted on 12th November 1999 (Holt 1999). **Seasonal status**:

1996	earliest record: 13th October	latest record: 9th November
1997	4th November	16th November
1998	12th October	6th December
1999	26th September	16th December
2000	24th October	4th December

Indian Roller

There is an unseasonal record from March 1993 (Willoughby 1993). **Migration**: The fact that a bird was killed in a collision with an aircraft 54 kilometres off Goa and at an altitude of 2424 metres in October (Satheesan 1990) suggests a possible migratory route from the Arabian Peninsula or the Horn of Africa, across the northern Arabian Sea, to the Western coast of India.

(755-7) **Indian Roller** ***Coracias benghalensis*** (Linn.)

First recorded by Saha and Dasgupta (1992), who collected it in the Cotigao WS on 29th December 1968 during one of their collecting trips for the Zoological survey of India. The specimen was ascribed to the subspecies *C. b. indica*. **Status**: This species is a somewhat capricious, though regular dry season visitor, common in some years, uncommon to fairly common in others. It occurs in the entire coastal belt and, to a lesser degree, the midland region and at the base of the Western Ghats. **Habitat**: As European Roller. **Seasonal status**: Indian Rollers arrive usually during the second half of October (earliest record: 21st September) and depart variously between the end of March and mid-April (latest record: 12th May).

(758-62) **Dollarbird *Eurystomus orientalis*** (Linn.)

(Broad-billed Roller, Dark Roller, Asian Broad-billed Roller) **Status**: Unclear. Possibly a stray from the southern part of the Western Ghats where this species is a scarce resident. **Habitat**: Semi-evergreen forest **Site and sighting**: Frost (pers. comm.) along with a small party of British birdwatchers observed two, possibly three, adult birds *ca.* one kilometre along the forest track from the Hedumol checkpost to Bela, in the Cotigao WS on 14th March 2001.

ALCEDINIDAE, HALCYONIDAE, CERYLIDAE
Small Kingfishers, Large Kingfishers and Pied Kingfishers

(722-4) **Common Kingfisher *Alcedo atthis*** (Linn.)

(Eurasian Kingfisher, Kingfisher, River Kingfisher, Small Blue Kingfisher)

First reported by Grubh and Ali (1976), who collected it at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. The subspecies was identified as *A. a. taprobana*. **Status**: A common and widespread breeding resident that is found throughout the state, from the shoreline to the crest of the Western Ghats. **Habitat**: This kingfisher frequents any water body – saline, brackish or freshwater – from tidal pools on rocky coasts to streams in densest wet evergreen forest on the crest of the Ghats. **Population**: At least 25 birds were counted along a 5-6 kilometres long stretch on the western side of the Cumbarjua canal and its side-creeks on 14th March 2000. **Breeding status**: Digging of a nesting tunnel was observed during June 1987, the feeding of a fledgling on 20th July 1984. There are strong indications that this species regularly raises a second brood between August and November. **Seasonal status**: During the dry season, November through May, the resident population is augmented by an influx of apparently nomadic or migratory birds.

(725-6a) **Blue-eared Kingfisher *Alcedo meninting*** Horsfield

(Deep Blue Kingfisher)

First reported by Grubh and Ali (1976), who collected two specimens, one at Canacona and another at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. Identifying them as *A. m. coltarti,* they noted that it was impossible to distinguish *coltarti* and *rufigaster*. **Status**: Uncertain. Probably a scarce dry season visitor of the Western Ghats, from the foothills to the crest. **Habitat**: Shady pools, streams and small rivers in semi-evergreen and wet evergreen forest. **Sites and sightings**: Bhagwan Mahavir WS (11 sightings); Bondla WS (1) and Cotigao WS (1). **Observers**: Featherstone, Frost, Holt (1996a, 1998), Leigh (1997) and the author. **Population**: 11 sightings were of single birds, two

sightings of two birds. **Seasonal status**: The absence of any sightings during the monsoon months of June, July, August and September suggests that this kingfisher is nomadic during the rains. **Remarks**: Wherever the Blue-eared Kingfisher is found, it occurs side by side with the very similar Common Kingfisher.

(727-8) **Oriental Dwarf Kingfisher** ***Ceyx rufidorsa*** (Linn.)

(*Ceyx erithacus*, Black-backed Kingfisher, Oriental Kingfisher, Three-toed Kingfisher, Three-toed Forest Kingfisher)

First reported by Rane (1983), who observed it at Collem and Mollem during one of his Goa trips from 18th – 24th May 1981, 6th – 10th April and 16th – 22nd June 1982. **Status**: Uncertain. Probably a rare or occasional resident or seasonal visitor at the base of the Western Ghats (up to *ca.* 100 metres). Occurs very rarely in the coastal belt (on migration? Nomads?). **Habitat**: Streams and trickles in semi-evergreen and wet evergreen forest; small rivers that are densely lined with trees and bushes, in cultivation; patches of remnant semi-evergreen woodland and overgrown gardens. **Sites and sightings**: The best chance to see this exceptionally beautiful kingfisher is in the Bondla WS (12 sightings) where the most promising spot appears to be the stream at the zoo entrance. Five sightings are from the Bhagwan Mahavir WS and three from the coastal belt of Bardez taluka (Candolim and Sinquerim). **Observers**: Djerf (1997), Duffield (2000), Frost, Holt (1997, 1998a, 1998b), Jännes (1998), Luoto (1999), Manville, Marsh (1998), Prasad (1995), Ransdale (1998), Tunturi (1997), Wadsworth (1999), van der Wielen (1998) and the author. **Seasonal status**: Recorded in all seasons; no pattern is discernible. **Remarks**: This kingfisher is highly erratic in its habitat predilections as well as in its seasonal appearances and disappearances.

(730-2) **Stork-billed Kingfisher** ***Pelargopsis capensis*** (Linn.)

(Brown-headed Stork-billed Kingfisher)

First recorded by Saha and Dasgupta (1992), who collected a sub-adult male of the nominate race at Poinguinim on 15th February 1978. **Status**: A fairly common resident that is found in all zones, from the seashore to just below the crest of the Western Ghats (up to *ca.* 500 metres). **Habitat**: This kingfisher is liable to frequent any kind of water body – saline, brackish or freshwater, e.g. tide-washed rocks in the surf-zone, creeks and saltpans; standing paddy, seasonal ponds and streams during the monsoon; perennial rivers, streams and pools in all types of forests, even dense wet evergreen. **Breeding status**: Noisy courtship rituals at the end of May and during the first half of June suggest that this species breeds during the southwest monsoon, but direct proof is still absent. **Seasonal status**: There is a marked influx of apparently nomadic birds at the beginning of the southwest monsoon, in early and mid-June. They gradually disappear in the latter part of the dry season when many wetlands dry up.

(735-8) **White-throated Kingfisher *Halcyon smyrnensis*** (Linn.)

(White-breasted Kingfisher, Smyrna Kingfisher)

First recorded by Saha and Dasgupta (1992), who collected a specimen of the subspecies *H. s. fusca* near Margao, on 16th December 1968, during one of their collecting trips for the Zoological Survey of India. **Status**: A very common breeding resident found throughout the state, from the seashore to the base and slopes of the Western Ghats; uncommon on the crest. **Habitat**: In addition to all the water bodies listed for the Stork-billed Kingfisher, the White-throated Kingfisher occurs in a wide array of arid and dry habitats that are often far from water. **Breeding status**: This species is a widespread breeder between early April and mid-July. **Seasonal status**: This kingfisher occurs throughout the year without marked fluctuations in numbers being noticeable.

(739) **Black-capped Kingfisher *Halcyon pileata*** (Boddaert)

First recorded on the seashore at Velsao on 20th December 1980. **Status**: Uncertain. This uncommon to scarce, very local species is a nomadic, dry season visitor of the entire coastal region and the base and crest of the Western Ghats. It is absent from the midland region and the slopes of the Ghats. **Habitat**: Saline as well as brackish and freshwater bodies of the coastal belt are frequented, e. g. rocky seashore, mangrove-lined creeks, inland estuaries, salt pans, marshes, flooded or irrigated rice-paddies during the *vaingonn* (winter) crop-season etc. In the Western Ghats, this kingfisher is found at slow moving, pool-like stretches of rivers and streams in semi-evergreen and dense wet evergreen forest. **Coastal sites**: Terakol, Keri, Morjim, Parshem-Agarwaddo, Tuem-Arabo (Pernem); Chapora estuary, Baga creek, Pilerne pond, Candolim marsh, Nerul bridge area, Sinquerim marsh (Bardez); Chorao Bird Sanctuary, Divar, Carambolim lake, Cumbarjua canal, Merces, Neura wetlands (Tiswadi); Sao Jacinto Island, Bogmalo beach, Issorcim, Velsao (Marmagoa); Chinchinim (Salcete); Cabo de Rama, Talpona (Canacona). **Western Ghat sites**: Backwoods Camp, Khandepar river at Collem, Dudhsagar track, Dudhsagar Falls, bottom and top, Devil's Canyon, Cotigao WS. **Seasonal status**: Recorded throughout the year except during the monsoon months of June, July, August and September. The earliest appearance was noted on 7th October, the latest bird was sighted on 11th May.

(740-3) **Collared Kingfisher *Todiramphus chloris*** (Boddaert)

(*Halcyon chloris*, White-collared Kingfisher)

First reported by Claydon (1993), who observed one bird at the Chapora river on 19th November 1993. **Status**: Unclear. Probably a year-round resident and confirmed breeder in isolated localities of the Zuari-Mandovi basin. **Habitat**: Restricted to mangrove-fringed creeks and estuaries. **Sites and sightings**: Apart from the two

isolated sightings at unspecified locations along the Chapora river and on Chorao island, all records are from the Cumbarjua canal, a semi-natural waterway linking the Mandovi and Zuari rivers. There the Collared Kingfisher prefers shady and mangrove-fringed side-creeks that cut deeply into the surrounding farmland. **Observers**: Arnold (1997), Claydon (1993), Frost (pers. comm.), Gregory, Hall (1995), Jännes (1997), Marsh (1998), Prasad (1996), Harvey d'Souza (pers. comm.), Sykes (1999), Todd (2000), Tunturi (2000), Willoughby (1995) and the author. **Population**: Up to 11 birds were counted along the full length of the Cumbarjua canal. The entire population of this species in Goa consists of probably just over a dozen birds. **Breeding status**: Harvey d'Souza (pers. comm.), a reliable Goan birdwatcher and naturalist specialized in boat trips on the Cumbarjua canal saw two Collared Kingfishers entering a nest hole in the dyke lining one of the side creeks of the Cumbarjua canal, on 15th May 2000. **Seasonal status**: Present at least from November (earliest record: 3rd) to May (latest record: 15th). No boat trips on the Cumbarjua canal were undertaken between May and November. **Remarks**: The western subspecies *H. c. vidalis* was originally described from Kelsi Creek, a small area in Ratnagiri distr., Maharashtra, *ca.* 180 kilometres to the North, which along with Goa and an unsubstantiated occurrence in Kerala holds the entire population of this race of the Collared Kingfisher.

(719-20) **Pied Kingfisher** *Ceryle rudis* (Linn.)

(Lesser Pied Kingfisher, Small Pied Kingfisher, Indian Pied Kingfisher)

First recorded on 17th August 1980 at Anjuna. **Status**: A fairly common resident and probable breeder that is found from the coastal belt, where it is commonest, to the base of the Western Ghats, where it is uncommon. **Habitat**: Tidal rock-pools on the seashore, creeks, saltpans; freshwater lakes, pools and wetlands; slow moving rivers and shady pool-like stretches of rivers in semi-evergreen and wet evergreen forest. **Population**: On a 5-6 kilometres long stretch of the Cumbarjua canal 10+ birds were counted. Most commonly seen in twos and threes, occasionally in loose groups of 6-7 birds. **Breeding status**: Four birds were observed fighting over a nest-hole in a cutting on a hillside above the wetlands of Curca on 23rd September 1999. **Seasonal status**: Recorded in every month without major fluctuations in numbers.

MEROPIDAE
Bee-eaters

(753) **Blue-bearded Bee-eater** *Nyctyornis athertoni* (Jardine & Selby)

First reported by J. D. Panday, one of the five members of the BNHS ornithological survey of 1972, was headed by Grubh and Ali (1976). He noted it at Mollem

sometime during the period from 27th November to 12th December 1972. Saha and Dasgupta (1992) collected a female specimen near Mollem on 28th September 1977 and ascribed it to the nominate race. **Status**: This reticent and inconspicuous bird is a rare year round resident that is found in the lower reaches and outlying hills of the Western Ghats, up to *ca*. 200 metres. **Habitat**: Moist deciduous, semi-evergreen and not too dense evergreen forest is frequented. **Sites and sightings**: The reservoir in the Bondla WS is the most likely spot where this bee-eater can be observed. Twelve of the altogether 20 records in Goa are from this small area while the remaining sightings are from various locations in the Bhagwan Mahavir WS. **Observers**: Carthy (1998), Frost, Holt (1996b, 1997, 1998a, 1998b), Jännes (2000), Leigh (1997), Manville and the author. **Population**: The entire population of Goa consists of probably less than 10 individuals. **Seasonal status**: Recorded in all months except January and August, this bird is doubtlessly a year-round resident.

(749-52) **Green Bee-eater *Merops orientalis*** Latham

(Little Green Bee-eater, Small Green Bee-eater)

First reported by Saha and Dasgupta (1992), who collected a female specimen of the nominate race at Colva Beach, on 19th December 1968, during one of their collecting trips for the Zoological Survey of India. **Status**: This abundant dry season visitor, common bi-annual passage migrant and scarce summer resident is subject to poorly understood local movements. It is encountered from the seashore through the midland region to the crest of the Western Ghats. **Habitat**: Cultivation, palm-groves, pastures, flooded and fallow paddy-fields, wasteland, railway cuttings and embankments, clearings in all types of forest, saline and freshwater wetlands with a scattering of bushes etc. **Population**: Maximum numbers observed were 150 birds roosting at the Baga hill on 2nd February 1995 (Hill 1995) and on 11th January 1999 (Lassey 1999). **Seasonal status**: With the onset of the annual hot season, around mid-March, the large dry season population starts decreasing until there are hardly any birds present in the first half of April. A fresh influx of mostly moulting and tailpinless birds begins in mid-April and lasts usually till the end of May. The end of the hot season and the onset of the SW-monsoon (around 6th June) see a sharp drop of numbers. Throughout June, July and most of August, only a few dozen Green Bee-eaters will be present in Goa though a lull or break in the rains can bring a sudden influx of hundreds, indicating that they had migrated not farther than the much drier Deccan Plateau, just across the ridge of the Western Ghats. The abating of the monsoon at the end of August sees a general return of the large numbers of dry season visitors. **Remarks**: Dennis' (1999) opinion that 'the Goan birds are of the subspecies *M. o. beludshicus* with a distinctive chestnut crown and nape' does not hold water since all the 15 specimens that were collected all over the state by Saha and Dasgupta (1992) for the Zoological Survey of India, between December 1968 and March 1978 were identified by them as belonging to the nominate race *M. o.*

orientalis. The 'distinctive chestnut crown and nape' is an optical illusion due to the reflection of sunlight at a certain angle.

(748) **Blue-tailed Bee-eater *Merops philippinus*** Linn.

First reported by Grubh and Ali (1976), who noted it in small numbers at Mayem Lake and near Bicholim during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A fairly common, locally very common dry, season visitor and biannual passage migrant throughout the state, from the seashore to the crest of the Western Ghats. Absent only from the middle and upper slopes of the Ghats. **Habitat**: This species frequents a wide variety of habitats, ranging from coastal headlands and promontories (from where it often hawks hundreds of metres out over the sea), estuaries, saltpans, saline and freshwater wetlands, dry and barren or bush-covered midland plateaus, islands of *vaingonn* paddy cultivation in the forests at the foothills of the Ghats to *sholas* and grassland on the crest. Seasonal **status**: During the autumnal incoming passage in September (earliest sighting: 23rd August) congregations of 250-300 birds may be seen hawking on plateaus and hillsides. Spring passage is less marked. Departure of the winter visitors stretches throughout April and into the last 10 days of May.

(744-5) **Chestnut-headed Bee-eater *Merops leschenaulti*** Vieillot

First reported by Grubh and Ali (1976), who collected a specimen at Mollem and also observed it at Mayem Lake during their ornithological survey of Goa from 27th November to 12th December 1972. They identified it as the nominate *M. l. leschenaulti*. **Status**: Uncommon, locally fairly common, resident around the base and lower slopes of the Western Ghats (up to *ca*. 250 metres) and on the adjacent eastern rim of the midland region. **Habitat**: Open and lightly wooded country, forest fringes and clearings, cashew orchards, rice paddies in forest clearings, waterlogged pastures and rivers and streams in moist deciduous, semi-evergreen and even dense wet evergreen forest. **Sites**: Collem, Mollem, Tambdi Surla, Devil's Canyon, Sunset Trail, Dudhsagar railway station, Sonaulim, Nandan (all in the Bhagwan Mahavir WS); Bondla WS; Selaulim water treatment plant; Cotigao WS. **Population**: A steady decline in the numbers of this bee-eater began in the mid-eighties. But since 1996 the population has stabilized. Large night roosts were observed on the fringes of the Bhagwan Mahavir WS. In February and March of 1984 and 1985, up to 200 birds used to roost regularly in a large tree on the banks of the Khandepar river, just half a kilometre from Collem. Duffield (2000) found a roost of over 100 birds, late evening on 13th February 2000, by the roadside two kilometres from Tambdi Surla. **Seasonal status**: Recorded throughout the year. Appears to be more common in winter, especially during February-March. **Remarks**: The Chestnut-headed Bee-eater is frequently seen in the company of Blue-tailed and Green Bee-eaters, hawking dragonflies over the isolated islands of paddy cultivation in the forests of the Western

Ghats when the plowing and transplanting for the *vaingonn* winter crop is in full swing at the end of December. Under certain light conditions the chestnut sheen on the crown and nape of a Green Bee-eater can be as intense as a Chestnut-headed Bee-eater's and lead to misidentifications.

CUCULIDAE

Old World Cuckoos

(570-1) **Pied Cuckoo *Clamator jacobinus*** (Boddaert)

(Pied Crested Cuckoo, Jacobin Cuckoo, *Oxylophus jacobinus*)

First recorded in the Nagoa valley on 24th June 1981. **Status**: Uncertain. This species is an uncommon monsoon visitor and possible breeder in Goa. It is also thought to be a local migrant. Found mostly in the coastal belt, rarely at the base of the Western Ghats. **Habitat**: Hedgerows in wetlands, lightly wooded plateaus, power-lines across stubble fields, cashew plantations, woodlands and tracts of remnant semi-evergreen forest etc. **Sites**: Terakol, Morjim, Chopdem (Pernem); Siolim, Sodiem, Anjuna, Nagoa valley, Baga creek and fields, Verla-Canca, Saligao, Calangute, Nerul bridge (Bardez); Chorao, Divar, Carambolim lake, Talaulim, Dona Paula (Tiswadi); Collem, Bhagwan Mahavir WS (Sanguem); Cabo de Rama, Cotigao WS (Canacona). **Seasonal status**: The Pied Cuckoo usually appears towards the end of June (earliest record: 27th May) and departs during the second half of November (latest: 18th December).

(573-4) **Common Hawk Cuckoo *Hierococcyx varius*** Vahl

(Brainfever Bird, *Cuculus varius*)

First reported by Saha and Dasgupta (1992), who collected a specimen on 24th March 1973 in the Cotigao WS, during one of their collecting trips for the Zoological Survey of India. They ascribed the specimen, a juvenile female, to the nominate race *H. v. varius*. **Status**: Predominantly an uncommon summer visitor to the plateaus and scarps of the midland region and the base and outlying hills of the Western Ghats; scarce in the coastal belt. **Habitat**: All sorts of open woodland – bush jungle, cashew plantations, secondary forest, village outskirts, forest fringes, etc. **Sites**: Terakol, Mandrem (Pernem); Nagoa valley, Baga hill, Sangolda, Candolim (Bardez); Mayem, Assonora (Bicholim); Ciba-Geigy, Carambolim, Pilar, Neura, Santa Cruz (Tiswadi); Farmagudi, Bondla WS (Ponda); Bhagwan Mahavir WS, Kalay, Collem, Mollem (Sanguem); Candollem (Quepem); Cotigao WS (Canacona). **Population**: The highest number recorded were 7+ birds along the 4-5 km long main road between Mollem and Collem, on 9th July 1988. **Seasonal status**: Recorded throughout the year but commonest during the southwest monsoon.

Monthly number of sightings

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
Author	-	1	8	5	4	4	4	4	7	4	2	-
Others	4	5	2	1	-	-	-	-	-	-	3	6

Remarks: This otherwise secretive and unobtrusive cuckoo acquires the status of a nuisance during the hot season, from mid-March to the beginning of June, with its *crescendo* 'brainfever' calls.

(576) **Indian Cuckoo *Cuculus micropterus*** Gould

First reported by Grubh and Ali (1976), who noted it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: Unclear. Probably a rare dry season visitor, possibly a spring passage migrant. Recorded from the coastal belt, the midland region and the foothills of the Western Ghats (up to *ca.* 120 metres). **Habitat**: Open woodland, fields with adjacent woodland, not too dense secondary, semi-evergreen and evergreen forest. **Sites and sightings**: Bondla WS (4 records), Mollem (2), Selaulim (1), Carambolim fields (1), banks of the Zuari river (1). **Observers**: van der Dol (1998), Sutton (1997), Sykes (1999) and the author. **Seasonal status:** All records were made between the end of November and 19th May.

(577-9) **Eurasian Cuckoo *Cuculus canorus*** Linn.

(Common Cuckoo, The Cuckoo)

First recorded at Arpora on 11th October 1982. **Status**: Shifting. The only three sightings of this species ever made up to 1995 suggested a very rare, short and punctual autumn passage migration. At some point between 1990 and 95 this pattern appears to have undergone a radical change along the lines of European Roller *Coracias garrulus* and Amur Falcon *Falco amurensis*. What seemed at first, in the mid-nineties, a small series of irruptions of possibly nomadic birds has now turned into a regular and extended migratory movement of erratically fluctuating numbers of Eurasian Cuckoos, covering the months of October and November and spread over almost the entire southern Indian peninsula. **Habitat**: This cuckoo is invariably found perched on power lines across wasteland, pastures, stubble fields and grassy lateritic plateaus with a scattering of bushes. **Favourite sites**: Arambol (Pernem); Siolim, Assagao, Anjuna, Arpora, Baga, Nagoa-Parra, Tivim-Damedem, Saligao***, Calangute**, Candolim (Bardez); Naroa (Bicholim); Chorao, Divar-Navelim, Carambolim grasslands, Ciba-Geigy, Cumbarjua (Tiswadi); Bondla WS (Ponda); ZAC reservoir* (Marmagoa); grasslands between Mollem and Collem (Sanguem); Agonda (Canacona). **Sightings**: Single birds were noted on 11th October 1982 at Arpora, 10th October 1983 at Naroa and 9th October 1988 at Chorao.

1995 a single bird at Cumbarjua on 9th November (Addey 1995)
1996 13 records of up to 27+ birds at 10 sites, from 10th October – 8th November (Frost, author)
1997 two records of up to 6+ birds at one site, on 4th and 13th October (Frost, author)
1998 five records of up to five birds at three sites, from 7th October – 11th November (Frost, Holt 1998b, author)
1999 26 records of up to 12+ birds at 11 sites, from 30th September – 20th November (Frost, Holt 1999, Robson 1999, author)
2000 one record of a single bird on 1st November
2001 eight records of up to three birds at seven sites, from 5th October – 2nd November (Frost, author)

Seasonal status: All sightings are from the period between 30th September and 20th November.

(581) **Lesser Cuckoo *Cuculus poliocephalus*** Latham

(Small Cuckoo, Little Cuckoo)

First reported by Saha and Dasgupta (1992), who collected a female specimen of the nominate race *C. p. polio- cephalus* at Mollem, on 24th September 1977, during one of their collecting trips for the Zoological Survey of India. **Status**: Very rare autumn visitor or passage migrant, recorded once in the coastal belt and three times at the base of the Western Ghats. **Habitat**: Open woodland, moist deciduous and moderately dense semi-evergreen forest. **Sites and sightings**: Single birds were observed at Kalay on 26th November 1988, at Sinquerim-Aguada in December 1996 (Prasad 1996) and in the Bondla WS on 29th October 1999 (Frost, Manville, author).

(582-3) **Banded Bay Cuckoo *Cacomantis sonneratii*** (Latham)

(Indian Banded Bay Cuckoo, Bay-banded Cuckoo)

First reported by Rane (1983), who observed it at Mollem during one of his Goa trips from 18th – 24th May 1981, 6th – 10th April and 16th – 22nd June 1982. **Status**: An uncommon breeding resident or dry season visitor of ridges and plateaus of the coastal and midland regions and the base of the Western Ghats; probably monsoon nomadic. **Habitat**: Open woodland and remnant semi-evergreen forest at the base and scarp of plateaus, outskirts of well-wooded villages. **Sites**: Baga hill**, Nagoa valley***, Anjuna, Porvorim (Bardez); Dona Paula, Carambolim, Bambolim (Tiswadi); Mayem lake (Bicholim); Bondla WS (Ponda); Bhagwan Mahavir WS, Tambdi Surla, Mollem, Collem (Sanguem). **Population**: All 55 sightings are of singles, only one is of two birds. **Breeding status**: A fledgling was observed as it was fed by a pair of Common Ioras *Aegithina tiphia* from 11th November until 2nd December 1984, in a valley of the Nagoa-Parra plateau. **Seasonal status**: Recorded

in all months except July and August; few records exist from September and October; most sightings date from April, May, June and November.

(584) **Grey-bellied Cuckoo *Cacomantis passerinus*** (Vahl)

(Grey-bellied Plaintive Cuckoo, Indian Plaintive Cuckoo)

First reported by Rane (1983), who observed it at Mollem during one of his Goa trips from 18th – 24th May 1981, 6th – 10th April and 16th – 22nd June 1982. **Status**: This noisy and conspicuous cuckoo, a subcontinent endemic, is a fairly common summer and monsoon visitor that is found from just behind the seashore through the midland region to the base of the Western Ghats. **Habitat**: Occurs in a narrow range of woodlands, mainly in moist deciduous and semi-evergreen forest, groves and well-wooded villages. **Sites**: Terakol*, Parshem-Agarwaddo (Pernem); Nagoa valley**, Anjuna, Camurlim, Siolim, Baga hill (Bardez); Assonora (Bicholim); Ciba-Geigy, Carambolim (Tiswadi); Bhagwan Mahavir WS, Collem, Caranzol (Sanguem). **Distribution**: Not yet recorded south of the Zuari river. **Seasonal status**: The migrants arrive from early to late May (earliest: 28th April) and depart between mid-October and early November. There are nine unseasonal winter sightings of single birds, stretching from 21st November to 3rd April.

(588-9) **Drongo Cuckoo *Surniculus lugubris*** (Horsfield)

First reported by Rane (1983), who observed it at the Bondla WS and Bhagwan Mahavir WS during his Goa trips from 18th – 24th May 1981, 6th – 10th April and 16th – 22nd June 1982. **Status**: An uncommon monsoon visitor to hills and ridges in the coastal belt, to the midland region and the outlying hills and lower slopes (up to *ca.* 150 metres) of the Western Ghats; rare during the dry season. **Habitat**: A wide range of woodlands, but mainly semi-evergreen, at the base and slopes of plateaus and hills. **Sites**: Terakol (Pernem); Nagoa valley***, Camurlim (Bardez), Assonora (Bicholim); Cumbarjua canal (Tiswadi); Bondla WS** (Ponda); Bhagwan Mahavir WS, Mollem (Sanguem); Cotigao WS (Canacona). **Population**: Only single birds were encountered. **Seasonal status**: Influx is noticeable in early June (earliest sighting: 18th May), departure in early October (latest record: 20th). Eleven unseasonal sightings of single birds were made between 5th November and 18th April.

(590-2) **Asian Koel *Eudynamys scolopacea*** (Linn.)

(Indian Koel, Common Koel, Koel Cuckoo, *Chrysococcyx melanorhyncha*)

First reported by Saha and Dasgupta (1992), who collected the first of many specimens at Margao, on 17th December 1968. All specimens were ascribed by them to the nominate *E. s. scolopacea.* **Status**: A very common breeding resident of the coastal and midland region, uncommon at the base and on the crest of the Western

Ghats. **Habitat**: Being brood-parasitic, this cuckoo occurs wherever House Crows *Corvus splendens* are found. In addition, koels seem to have a penchant for mangroves, sea holly and trees growing on dykes lining saline and brackish creeks. **Seasonal status**: Recorded throughout the year. No fluctuations of the population were observed. **Breeding status**: Fledglings (with House Crows as hosts) were observed in February, April and November.

(595) **Blue-faced Malkoha *Phoenicophaeus viridirostris*** (Jerdon)

(Small Green-billed Malkoha, *Rhopodytes viridirostris*)

First reported by Saha and Dasgupta (1992), who collected a specimen at Ponda on 20th December 1968 during one of their collecting trips for the Zoological Survey of India. **Status**: This Indian subcontinent endemic is an uncommon resident from the coast to the base of the Western Ghats and of some of their outlying hills, bottom to top. **Habitat**: Scrub and brushwood, open wooded tracts, bush-covered railway embankments, bamboo clumps, cashew-covered hillsides and plateaus, village outskirts and mangroves. **Sites**: Terakol, Arambol, Morjim, Chopdem (Pernem); Siolim, Nagoa valley*, Assagao, Anjuna, Saligao spring, Candolim hill, Baga, Porvorim (Bardez); Mayem lake (Bicholim); Vagheri hill***, Golaulim (Sattari); Cumbarjua canal, near Carambolim, Dona Paula (Tiswadi); Bondla WS (Ponda); Velsao (Marmagoa); Varca (Salcete); Tambdi Surla, Backwoods Camp (Sanguem); Chandranath hill (Quepem); Cotigao WS**, Poinguinim (Canacona). **Population**: The greatest likelihood of encountering this malkoha exists on Vagheri hill (*ca*. 790 metres) where a sizeable population extends right up to the summit. **Seasonal status**: Recorded in all months except July. By far the most sightings are from February, March, April and May. The fact that all the four sightings in June date from the first week (the southwest monsoon usually starts around 6th June), and the absence or near absence of sightings during July and August, points to a nomadic movement to avoid the heaviest rains.

CENTROPODIDAE
Coucals

(600-2) **Greater Coucal *Centropus sinensis*** (Stephens)

(Large Coucal, Common Crow-Pheasant)

First reported by Saha and Dasgupta (1992), who collected it at Mollem on 4th January 1969. They identified the specimen as *C. s. parroti*. **Status**: A common and widespread breeding resident from the coast to the base and on the crest of the Western Ghats. **Habitat**: Preferred haunts are the neighbourhood of cultivation and human habitations, overgrown gardens, scrub jungle, forest fringes, bamboo clumps, teak and rubber plantations, moist deciduous and semi-evergreen forest, sea-holly,

Greater Coucal

mangroves and other vegetation lining creeks. **Breeding status**: Fledglings were observed in October. **Seasonal status**: Recorded in unvarying numbers throughout the year.

(605) **Lesser Coucal** ***Centropus bengalensis*** (P. L. S. Müller)

(*Centropus toulou*)

Status: Uncertain. Possibly a stray from the adjacent parts of the Western Ghats. **Sightings**: A single bird was observed on the fringes of a cashew plantation surrounded by evergreen and moist deciduous forest at Sonaulim (altitude *ca.* 150 metres), in the Bhagwan Mahavir WS, on 25th December 1995 (Lainer 1999b). There are two historical records from the last decade of the 19th century, from areas bordering Goa: one by E. H. Aitken at Castle Rock (North or Uttar Kanara, Karnataka), just a

couple of kilometres from the Goa border and hardly 7 km from Sonaulim, the site of the Goa record (*fide* Davidson 1898); the other by Davidson at the Anshi Ghat, a few kilometres south of Goa and east of Karwar (Davidson 1898).

PSITTACIDAE
Parrots

(566-7) **Vernal Hanging Parrot *Loriculus vernalis*** (Sparrman)
(Indian Lorikeet)

First reported by Grubh and Ali (1976), who noted it at Valpoi during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A common resident that is subject to local and poorly understood movements. Found from the seashore through the midland region to the crest of the Western Ghats. **Habitat**: Coastal palm-groves, well-wooded villages, tracts of remnant semi-evergreen forest at the base and slopes of hills and plateaus in the coastal and midland region, dense semi-evergreen and wet evergreen forest in the Western Ghats. **Population**: Usually encountered singly or in small groups of up to five birds. **Seasonal status**: In the coastal belt it is absent or rare in January, February, March, April, June and most common in August and September. In the Western Ghats it is absent or rare in June, August, September, October and most common in January, February, November and December. Apparently, the Western Ghats population shifts during May-June down to the coastal belt, presumably to escape the worst of the rains. After the end of the southwest monsoon, in October-November, the birds return to the hills. **Miscellaneous**: In the coastal villages of Betul and Nuem (Quepem) and Cabo de Rama (Canacona), where this species is especially common, most houses have cages on their porch with a couple or so of locally captured birds.

(545-8) **Alexandrine Parakeet *Psittacula eupatria*** (Linn.)
(Large Parakeet)

First recorded on 18th January 1984 at Anjuna. **Status**: A scarce and very locally distributed breeding resident. Probably nomadic during the Southwest monsoon. **Distribution**: Restricted to a 28 kilometres long and not more than five kilometres wide stretch along the coast of North Goa, from Terakol in the North to Fort Aguada in the South. **Habitat**: Palm groves in well-wooded villages. **Sites and sightings**: Terakol (one sighting); Siolim-Gudem (1); Anjuna (hundreds of sightings); Arpora (hundreds); Baga (22); Calangute; Fort Aguada (1). **Population**: Between January 1984 and December 1989 only a single bird was present at Anjuna. By 1996 the population had increased to its present level of 5-6 birds. **Breeding status**: A pair attempted to breed – unsuccessfully – at Arpora-Kudach Wada in the second half of

February 2000 (Frost, pers.comm.). Circumstantial evidence indicates a breeding season extending from October into March. **Seasonal status**: Recorded in all months, but very rarely during the southwest monsoon (only six sightings from June through September). **Remarks**: The sudden emergence of such a minuscule isolated population, seemingly out of thin air, points to it having originated from escaped or intentionally released cage-birds.

(549-50) **Rose-ringed Parakeet** ***Psittacula krameri*** (Scopoli)

(Ring-necked Parakeet)

First recorded at Terakol on 29th July 1981. **Status**: A very common or locally abundant resident and probable breeder that is present from the surf-line, throughout the coastal belt and midland region to the base of the Western Ghats. **Habitat**: Typically found in coastal groves of coconut palms in and around villages and, decreasingly, in the wooded valleys of the midland region and deciduous as well as semi-evergreen forests at the foot of the Ghats. **Seasonal status**: Present throughout the year in unvarying numbers. **Breeding status**: This species is certainly breeding in Goa but there is no conclusive breeding record yet! **Remarks**: Towards the end of the monsoon, in August and September, these parakeets occasionally congregate in larger flocks (up to 200+ birds) to feed on the ripening paddy, often ripping the standing crop literally to shreds.

(557-8) **Plum-headed Parakeet** ***Psittacula cyanocephala*** (Linn.)

(Blossom-headed Parakeet)

First reported by Saha and Dasgupta (1992), who collected three specimens of the nominate race *P. c. cyano-cephala* at Poinguinim on 23rd December 1968. **Status**: This subcontinent endemic is a common and widespread resident and likely breeder that is found throughout the state and absent only from the middle and higher slopes of the Western Ghats. This species is typically slightly less common than the Rose-ringed Parakeet in the coastal belt and much of the midland region. In the Ghats this situation is reversed. **Habitat**: Less partial to open woodland and cultivation than Rose-ringed Parakeet; prefers tracts of remnant woodlands in the coastal belt, well-wooded valleys in the midland region and semi-evergreen and evergreen forest at the foot of the Western Ghats. **Breeding status**: Female birds were observed inspecting nest-holes in January, February and November. **Seasonal status**: Recorded in all months in unvarying numbers; no seasonal movements are discernible.

(564) **Malabar Parakeet** ***Psittacula columboides*** (Vigors)

(Blue-winged Parakeet)

First reported by Grubh and Ali (1976), who noted it at Canacona and Mollem during their ornithological survey of Goa from 27th November to 12th December

1972. **Status**: Grubh and Ali (1976) had found this Western Ghats endemic 'generally common' during their survey of 1972. Saha and Dasgupta (1992) also termed it 'common in hilly terrain' in October 1977 when they collected a specimen at Mollem. At present, the Malabar Parakeet is an uncommon to scarce and partly monsoon-nomadic resident of the base, slopes (up to *ca*. 450 metres), crest and outlying hillocks of the Western Ghats. **Habitat**: Moist deciduous, semi-evergreen and wet evergreen forest is their chosen biotope. **Sites**: Golaulim (Sattari); Bondla WS (Ponda); Bhagwan Mahavir WS, Mollem, Collem, Backwoods Camp, mining area NW of Kalay, Neturlim (Sanguem.); Cotigao WS. **Population**: Usually seen in twos and threes or small groups of up to 5 birds. Small flocks of 8-12 are exceptional. **Seasonal status**: Recorded in all months except in September and October. Only a few birds remain during the southwest monsoon (June, July, August).

APODIDAE, HEMIPROCNIDAE
Swifts and Treeswifts

(685) **Indian Swiftlet *Collocalia unicolor*** (Jerdon)

(Indian Edible-nest Swiftlet, *Aerodramus unicolor*)

First recorded at Anjuna on 14th February 1981. **Status**: Endemic to Southwest India and Sri Lanka, this species is a fairly common, locally abundant dry season visitor mainly to a *ca*. 5 kilometres deep strip of the North Goa coastal belt. It was only once recorded in South Goa. Probably an uncommon, very local breeding resident at the base of the Western Ghats. **Habitat**: This swiftlet hawks mostly over coastal palm groves and mango topes, occasionally over paddy-fields and the forests of the Western Ghats. **Sites**: Terakol, Keri, Arambol, Mandrem, Morjim, Chopdem, Parshem-Agarwaddo, Alorna (Pernem); Siolim, Gudem, Anjuna, Arpora, Baga, Verla-Canca, Sinquerim (Bardez); Surla (Sattari); Bondla WS (Ponda); Collem, Mollem, Bhagwan Mahavir WS, Tambdi Surla, Backwoods Camp (Sanguem); Cotigao WS (Canacona). **Population**: Flock-size in the eighties used to be several hundreds (up to 1500+) of birds, with dozens of flocks passing over daily. From 1989 onwards, a steady decline of numbers was apparent, probably due to illegal commercial overexploitation of the breeding colony on the Vengurla Rocks. Only lately, since 1998/99, has the population shown first signs of a recovery. **Breeding status**: A breeding colony on the small Goan island of Anjediva, off Karwar (North or Uttar Kanara, Karnataka), which was until recently Goan territory, ceased to exist sometime in the early twentieth century when the nest cave collapsed (Telles 1938). **Seasonal status**: *Coastal belt*: Recorded throughout the year. Most numerous from November to March. Numbers drop sharply with the onset of the hot season, usually around 15th March, and even further with the beginning of the monsoon rains, usually during the first week of June. During monsoon only singles and groups of up to a dozen birds are to be seen. The first sizeable flocks return in the

second half of October. *Western Ghats*: Unclear. Recorded in all months except September and October. Seen rarely and only in singles during the monsoon months, in smallish flocks up to 150 birds during the dry season. **Diurnal movements**: At Terakol, Goa's northernmost village, from earliest dawn to about 9 am, a steady stream of swiftlets can be seen heading slowly though purposefully southward. In the evening the movement is reversed and the last birds are passing over in a northerly direction long after sunset. At Anjuna, *ca.* 20 kilometres to the South, the arrival is around sunrise and the departure close to sunset. This two-directional flight pattern and the time-lapse between their appearance and disappearance at Terakol and Anjuna suggests that these Indian Swiftlets originate from the vast breeding colony on the Vengurla Rocks, 16 kilometres off the coast between Vengurla and Malwan (Sindhudurg distr., Maharashtra) and *ca.* 32 kilometres north of Goa.

(692) **White-rumped Needletail *Zoonavena sylvatica*** (Tickell)

(White-rumped Spinetail, White-rumped Spinetail Swift, *Chaetura sylvatica*)

First reported by Grubh and Ali (1976), who collected a specimen at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: This Indian subcontinent endemic is a scarce dry season visitor to the Western Ghats and their outlying hills, from the base to the crest. **Habitat**: Invariably seen hawking over tracts of more or less contiguous forest – moist deciduous, semi-evergreen and evergreen. **Sites**: Bondla WS, Bhagwan Mahavir WS and Cotigao WS. There are two exceptional, if not doubtful, records from coastal areas in North Goa, one by Lassey (1999) who observed two birds over saltpans at Nerul on 10th January 1999, the other by Holt who recorded a single over Baga on 12th January 1996 (Holt 1996a). **Population**: It would be wrong to speak of 'population' with wide-ranging birds like this swift, but probably not more than 10-15 birds are ever present in Goa. **Seasonal status**: The absence of sightings in June, August, September and October points to a nomadic movement that is possibly not directly connected with the monsoon rains since there are three records from July, when the rains are heaviest.

(691) **Brown-backed Needletail *Hirundapus giganteus*** (Temminck)

(Brown Needletail, Large Brown-throated Spinetail Swift, *Chaetura gigantea*)

First reported by the author (1999b) who saw at least five birds over the forest between Collem and Kalay on 4th March 1985. **Status**: A rare and erratic visitor to the eastern rim of the midland region and the base and some outlying hills of the Western Ghats. **Habitat**: Ill-defined with a fast moving species as this needletail, but forested tracts appear to be preferred. **Sites and sightings**: Bondla WS (four sightings of up to 20 birds); between Collem and Kalay (one of 5+ birds); Bhagwan

Mahavir WS (two of up to two birds), Chandranath hill (one of four birds), Cotigao WS (five of up to 20 birds). **Observers**: van der Dol (2000), Duffield (2000), Frost (pers. comm.), Hill (1997), Holt (1997), Manville (pers. comm.), Tunturi (1998), Willoughby (1997) and the author. **Seasonal status**: 12 sightings date from the cool season, from 6th November to 15th March, one sighting from the southwest monsoon (27th July 2000). Not yet recorded in the hot season.

(707-8) **Asian Palm Swift *Cypsiurus balasiensis*** (Lichtenstein)

(Palm Swift, *Cypsiurus parvus*)

First reported by Grubh and Ali (1976), who noted it at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: An uncommon and very local breeding resident that is found almost exclusively in the coastal belt. A traditional night-roost exists in the village of Collem, at the foot of the Western Ghats. **Habitat**: This swift is strictly bound to the proximity of *borassus* palms. **Population**: Not counting the birds of the Collem night-roost whose provenance is unknown, there appears to be a breeding population of just over a hundred Asian Palm Swifts. Even this small number is dwindling steadily due to the over-ageing and gradual disappearance of *borassus* palms, almost all of which were planted during the Portuguese colonial regime. **Breeding status**: Small breeding colonies of up to 20-30 birds exist or existed in *borassus* palms in the municipal gardens of Panaji, Mapusa and Chauri. Other traditional colonies are to be found at Morjim, Baga, Chorao, Velim lake and Rajbagh. Breeding season is September to December. **Seasonal status**: Recorded in all months with almost constant frequency and in unchanging numbers.

(693-5) **Alpine Swift *Tachymarptis melba*** (Linn.)

(*Apus melba*)

First recorded on 6th February 1988, when a flock of over 40 birds was observed over the Nagoa valley. **Status**: Uncertain. Probably a scarce to uncommon and erratic dry season visitor to Goa, mainly to the meandering narrow strip where midland plateaus border on the coastal belt, but also to the coastal belt proper and to the base and crest of the Western Ghats. These roving swifts might originate from the vast breeding colony at the Jog falls (Uttar Kanara, Karnataka), *ca*. 100 kilometres south of Goa. **Sites**: Parxem (Pernem); Surla (Sattari); Nagoa, Baga hill, Candolim, Fort Aguada (Bardez); Divar-Navelim, Talaulim-Santana (Tiswadi); Bondla WS, near Khandepar (Ponda); Backwoods Camp (Sanguem); Cotigao WS (Canacona). **Seasonal status**: Recorded in January, February, March, April, October, November, December. **Population**: The largest flock observed consisted of 130+ birds over the Baga hill, on 4th December 2000 (Frost, pers. comm.).

(699-700) **Fork-tailed Swift *Apus pacificus*** (Latham)

(Pacific Swift, Large White-rumped Swift)

First reported by Pitt (1995), who saw a single bird over Baga on 1st January 1995. **Status**: Uncertain. Probably an uncommon and erratic dry season visitor and possible passage migrant. Records are scattered throughout the state but are most frequent in the coastal belt. Like the Alpine Swift, this species is subject to poorly understood local movements. This species' status in Goa may well have changed since the days when Davidson (1898) wrote he had found that 'this is the common Kanara swift ... I have seen it in considerable numbers on the ridge of the Ghats close to the Dudh Sagar station of the Portuguese railway at all seasons ...' On the other hand, this might be a case of erroneous identification since the tunnels close to the Dudhsagar railway station are known, since at least 1976, as the breeding place of numerous House Swifts *(Apus affinis)*. **Sites**: Baga, Arpora, Nerul bridge, Fort Aguada (Bardez); Carambolim lake, Neura wetlands, Santa Cruz (Tiswadi); Bondla WS (Ponda); Tambdi Surla (Sanguem); Cabo de Rama, Cotigao WS (Canacona). **Population**: Low single figure groups are the norm but flocks of up to 50 birds have been noted. **Seasonal status**: All records date from October through February.

(702-6) **House Swift *Apus affinis* (J. E. Gray)**

(Little Swift, *Apus nipalensis*)

First reported by Rane (1983), who observed it at Mollem and Panaji during one of his Goa trips, which took place from 18th – 24th May 1981, 6th – 10th April and 16th – 22nd June 1982. **Status**: An abundant breeding resident that is found throughout the state, from the coast to the crest of the Western Ghats. **Habitat**: This swift is liable to turn up anywhere in Goa, irrespective of habitat. **Breeding status**: Breeds commonly in towns, under bridges and in many of the 16 tunnels of the Braganza Ghat where the former Western India Portuguese-guaranteed Railway climbs from Collem up to Castle Rock (Uttar Kanara, Karnataka). Breeding season is practically throughout the year. At the Braganza Ghat, breeding was noted in February, March, April, May, July and November. **Seasonal status**: Recorded in all months. Between May and September many, though not all by far, House Swifts appear to turn nomadic, probably to avoid the monsoon rains.

(709) **Crested Treeswift *Hemiprocne coronata*** (Rafinesque)

(Crested Swift, *Hemiprocne longipennis*)

First reported by Saha and Dasgupta (1992), who collected a specimen of the subspecies *H. longipennis coronata* at Poinguinim on 28th December 1968, during one of their collecting trips for the Zoological Survey of India. **Status**: Uncommon, locally fairly common breeding resident that is found at the base and lower slopes of the Western Ghats and on the scarp of plateaus in the midland region. Roving singles

and small groups may appear almost anywhere between the seashore and the crest of the Ghats. **Habitat**: Invariably found hawking over well-wooded tracts, forests and clearings. **Sites**: Terakol, Arambol, Chopdem (Pernem); Oxel, Sodiem, Anjuna, Assagao, Arpora, Nagoa (Bardez); Naroa, Mayem lake (Bicholim); Surla, Nanorem (Sattari); Pilar pond, Ciba-Geigy (Tiswadi); Bondla WS, Savoi-Verem (Ponda); Bhagwan Mahavir WS, Collem, Mollem, Tambdi Surla (Sanguem); Chandranath hill (Quepem); Cabo de Rama, Galgibag, Gaodongrem, Cotigao WS (Canacona). **Breeding status**: Incubation was noted at the Devil's Canyon (Bhagwan Mahavir WS) during the first week of April 1985 and in the Nagoa valley on 5th March 1996 and between 19th March and 6th April 2001 (Frost, pers. comm.). Breeding is suspected on a ridge between Oxel and Sodiem where midland plateaus face the coastal belt. **Seasonal status**: Recorded throughout the year with more or less constant frequency except in June, August and October when fewer birds are present.

TYTONIDAE, STRIGIDAE
Barn Owls, Grass Owls and typical Owls

(606-7) **Barn Owl** ***Tyto alba*** (Scopoli)

First reported by Prasad (1996), who observed it at Agassaim in March 1996. **Status**: A scarce, probably largely overlooked resident in the coastal belt. The Barn Owl usually comes to the notice of birdwatchers only when people bring injured birds to them. **Habitat**: Villages and outskirts of towns. **Sites and sightings**: Baga, Candolim, Alto Porvorim (Bardez); Agassaim, Panaji (Tiswadi). **Observers**: Frost (pers. comm.), Holt (1996b, 1997, 1998a, 1998b), Manville (pers. comm.), Paresh Porob (pers. comm.), Prasad (1996) and the author. **Population**: All the 8 records are of single birds. **Seasonal status**: Not yet recorded during the southwest monsoon.

(616) **Oriental Scops Owl** ***Otus sunia*** (Hodgson)
(formerly Scops Owl, *Otus scops*, Oriental Scops-Owl)

First reported by Santharam (*in litt.*) who heard between 4 and 5 birds calling when he visited the Bondla WS from 1st – 3rd December 1995 during his survey of the White-bellied Woodpecker *Dryocopus javensis* in the Western Ghats. **Status**: Presumably an uncommon or locally fairly common resident (?) at the base of the Western Ghats (up to *ca.* 250 metres). **Habitat**: Moist deciduous, semi-evergreen and evergreen forest. **Sites**: Saligao spring (Bardez); Bondla WS (Ponda); Bhagwan Mahavir WS, Backwoods Camp (Sanguem). **Observers**: Anon (1998a), Duffield (2000), Holt (1996a, 1996b, 1997, 1998a, 1998b, 1999), Jännes (1998), Vermeulen (2000) and the author. **Population**: The Bondla WS appears to hold the largest population (11 voice-records of up to 10 birds) followed by the Backwoods Camp area (two voice-records of up to four birds) and the Bhagwan Mahavir WS (two

voice-records of single birds). **Seasonal status**: Uncertain. All records date from February, November and December.

(619-24) **Collared Scops Owl *Otus bakkamoena*** Pennant

(Indian Scops Owl, *Otus lempiji*)

First reported by Saha and Dasgupta (1992), who collected a specimen of the nominate race *O. b. bakkamoena* at Mollem on 4th October 1977, during their survey of Goa for the Zoological Survey of India. **Status**: A scarce resident and likely breeder in all three regions, from just behind the seashore to the slope of the Western Ghats (up to *ca.* 250 metres). **Habitat**: Well-wooded villages, clusters of large trees in towns and semi-evergreen forest. **Sites**: Terakol (Pernem); Anjuna, Calangute, Candolim, Saligao (Bardez); Mayem lake (Bicholim); Bondla WS (Ponda); Dudhsagar railway station, Tambdi Surla (Sanguem); Velsao (Marmagoa); Margao, Curtorim (Salcete); Cabo de Rama, Palolem, Kindlebag (Canacona). **Breeding status**: This owl certainly breeds in Goa but there is no proof yet. The breeding season should be during the winter months since it is most vocal in October, November and December. [Davidson (1898) had found a nest with 3 eggs on 29th January 1893 in the neighbourhood of Karwar (Uttar Kanara, Karnataka), just 15 kilometres to the South of Goa. **Seasonal status**: Recorded throughout the year.

(628-9) **Spot-bellied Eagle Owl *Bubo nipalensis*** Hodgson

(Forest Eagle Owl)

First reported by the author (1999b), who heard a single bird calling next to the Devil's Canyon, on 3rd March 1985. **Status**: Uncertain. A very rare and very local breeding resident or dry season visitor and breeder at the base of the Western Ghats (at an altitude of *ca.* 90 metres). **Habitat**: Fairly dense wet evergreen forest in the vicinity of rivers. **Sites, sightings and voice records**: One bird was heard calling next to the Devil's Canyon on 3rd March 1985, one was frequently seen crossing the river in daylight at the Devil's Canyon, on 29th March 1989, one was observed in daylight at a stream near Devil's Canyon, on 17th May 1996. Beevers (2000) 'staked out' a bird at Backwoods Camp, in the winter 2000. In the Cotigao WS, this species was noted by Hall (1995) at least once between 26th February and 10th March 1995. **Breeding status**: Beevers (1999) saw a female at nest at Backwoods Camp on 9th February 1999. **Seasonal status**: All the seven records extant are from the middle and end of the dry season. **Miscellaneous**: There is a historical record by Davidson (1898) from the Anshi Ghat (Uttar Kanara, Karnataka), *ca.* 10 kilometres south of Goa.

(631-2) **Brown Fish Owl *Ketupa zeylonensis*** (Gmelin)

(*Bubo zeylonensis*)

First recorded in a valley of the Nagoa/Parra plateau on 11th October 1981. **Status**: A scarce, locally fairly common and very locally distributed breeding resident of all three regions, from close to the seacoast to the base of the Western Ghats. **Habitat**: Patches of remnant semi-evergreen forest on the base of coastal ridges, densely wooded gullies and valleys on the scarp of midland plateaus facing the coastal belt, with saline fish-ponds and saltpans in the vicinity; environs of lakes and ponds in the midland region; rivers and streams in semi-evergreen and wet evergreen forest at the foot and lower slopes (up to *ca*. 180 metres) of the Ghats. **Sites**: Terakol (Pernem); Nagoa valley*, Baga hill (Bardez); Mayem lake (Bicholim); Bondla WS (Ponda); Back- woods Camp, Tambdi Surla, Bhagwan Mahavir WS** (Sanguem); Cotigao WS*** (Canacona). **Breeding status**: A brood was successfully raised in the Nagoa valley in February-March 2000 and a breeding attempt was made there in February 2001 (Frost, pers. comm.). **Seasonal status**: Recorded throughout the year though there is only one record each in June, July and August.

(658-60) **Brown Wood Owl *Strix leptogrammica*** Temminck

First recorded in a valley near Nagoa on 21st February 1986. **Status**: A scarce and local breeding resident or dry season visitor in the coastal belt and at the base and on outlying hills of the Western Ghats. **Habitat**: Tracts of remnant semi-evergreen forest in valleys on the scarp of midland plateaus facing the coastal belt; moist deciduous, semi-evergreen and evergreen forest at the foot of the Ghats. **Sites**: Nagoa valley, Arpora-Baga, Saligao spring (Bardez); Bondla WS (Ponda); Backwoods Camp (Sanguem). **Population**: There are 19 records of up to three birds. **Breeding status**: A pair successfully raised one young in the Nagoa valley in May 1986 (Lainer 1999b) and 1998 (Frost, Manville, pers. comm.). **Seasonal status**: The absence of records between early June and early November suggests that this owl might be nomadic during the southwest monsoon.

(636-7) **Jungle Owlet *Glaucidium radiatum*** (Tickell)

(Barred Jungle Owlet)

First reported by Saha and Dasgupta (1992), who collected a male specimen at Valpoi on 11th January 1969 during one of their many collecting trips to Goa for the Zoological Survey of India. They ascribed the specimen and four others that were collected later, to the subspecies *G. r. malabaricum*. **Status**: An uncommon but widespread breeding resident from the coastal belt through the midlands to the base and lower slopes of the Western Ghats. **Habitat**: Well-wooded villages, village groves, patches and islands of remnant semi-evergreen forest in the coastal belt and midland region; moist deciduous and semi-evergreen forest in the Ghats

and their outlying hills. **Sites**: Terakol, Parxem (Pernem); Anjuna, Socorro, Assagao, Candolim, Baga hill, Saligao spring (Bardez); Mayem lake (Bicholim); Valpoi (Sattari); Naroa, Carambolim (Tiswadi); Bondla WS, Khandepar (Ponda); Selaulim lake, Kalay, Mollem, Collem, Backwoods Camp, Bhagwan Mahavir WS (Sanguem); Cotigao WS, Canaguinim, Palolem-Colomba (Canacona). **Breeding status**: Fledglings were noted in May and July. Since this owlet is most vociferous from October to January, it can be assumed that a second breeding season begins at this time of the year. **Seasonal status**: Recorded throughout the year in unvarying numbers.

(650-2) **Spotted Owlet** ***Athene brama*** (Temminck)

(Spotted Little Owl, Tibet Owlet)

First recorded at Tivim-Danva on 22nd March 1981. **Status**: A common, noisy and conspicuous breeding resident of the coastal belt and the lowlands along creeks and tidal rivers that intrude bay-like into the midland region. Totally absent from the hilly midland region and the Western Ghats. **Habitat**: Village groves in the vicinity of paddy-fields, pastures and other open areas. **Population**: Up to a dozen birds were counted at dusk along a 2 kilometre stretch of road, at Anjuna. **Breeding status**: Fledglings were noted at Anjuna and Carambolim in mid-March and at the Baga creek in mid-January. **Seasonal status**: Recorded throughout the year in nearly constant numbers.

(642-5) **Brown Hawk Owl** ***Ninox scutulata*** (Raffles)

(Brown Boobook)

First recorded by the author (1999b) at Kalay on 11th December 1983. **Status**: An uncommon breeding resident that has been recorded in the coastal belt, on the eastern rim of the midland region and at the base of the Western Ghats. **Habitat**: Well-wooded villages and copses of ancient evergreen trees in the coastal belt; well-wooded hills and hillocks and semi-evergreen forest at the base of the Ghats. Rarely found far from human habitation. **Sites**: Candolim, Baga (Bardez); Carambolim-Dadda Dongrim (Tiswadi); Bondla WS (Ponda); Kalay, Mollem Tourist Complex, Backwoods Camp, Tambdi Surla (Sanguem); Cotigao WS (Canacona). **Breeding status**: A pair raised a brood of two during July-August 1999, at Carambolim-Dadda Dongrim. **Seasonal status**: Recorded throughout the year.

(664) **Short-eared Owl** ***Asio flammeus*** (Pontoppidan)

First reported by Holt (1997a), who observed a single bird flying high over Arpora-Baga, on 6th December 1997. **Status**: The absence of earlier sightings of this fairly conspicuous owl suggests that it must be considered a stray, though Goa falls well into its wintering range. The Western Ghats may form an insurmountable barrier for this bird of open grassy plains. **Other sightings**: One bird, possibly the same

that was recorded by Holt two days earlier *ca.* 8 kilometres further north, was seen by Ransdale (1998) at Fort Aguada, on 8th December 1997. Another single bird was observed by Beevers (1999) in the saltpans between Panaji and Ribandar, on 16th February 1999.

BATRACHOSTOMIDAE
Asian Frogmouths

(666) **Sri Lanka Frogmouth *Batrachostomus moniliger*** Blyth
(Ceylon Frogmouth)

First reported by Holt (1996a), who voice-recorded two birds in the Bondla WS on 1st February 1996. **Status**: This very secretive species, an endemic to Southwest India and Sri Lanka, is probably a scarce and very local resident (?) at the base of the Western Ghats. **Habitat**: Moist deciduous and secondary forest. **Sites and sightings**: Up to four individuals were either voice-recorded at night or seen in daylight (12 records in all) not far from the Tourist Cottages at the Bondla WS, at an altitude of *ca.* 220 metres, between 3rd November and 17th February in the years 1996-2000. Beevers (1999) recorded up to three birds at Tambddi Surla in early February 1999. At the Backwoods Camp, ones and twos were seen and heard by Beevers (1999), Dennis (1999) and Duffield (2000) in February and December 1999 and February 2000. **Seasonal status**: Since this bird was recorded only by visiting birdwatchers till date, all the records fall into the slightly cooler season, mid-November to mid-March.

EUROSTOPODIDAE, CAPRIMULGIDAE
Eared Nightjars and Nightjars

(668-9) **Great Eared Nightjar *Eurostopodus macrotis*** (Vigors)

First reported by Grubh and Ali (1976), who heard it at Valpoi during their ornithological survey of Goa from 27th November to 12th December 1972. They noted that 'the characteristic whistling *whi-wheeew* calls were regularly heard in the evening at dusk.' The validity of these 'heard-only' encounters was questioned by Abdulali (1980a), who suggested that the Sri Lanka Frogmouth, whose vocalisations were then still undescribed, could have been the culprit. Ali (1980) replied, that the birds were first heard by Dr. Grubh and that Ali was already familiar with the nightjar's vocalisations and had 'no doubt' about the record. **Status**: Unclear. A very rare and local resident or winter visitor at the base of the Western Ghats and, possibly, the midland region. **Habitat**: Open woodland and cultivation with a scattering of trees. **Other voice-records**: One bird was heard near Valpoi-Pali on 28th February 1985

and a doubtful single call was heard in the Bondla WS on 22nd January 2000. On the same date, Lassey (2000) reported to have heard two birds at Tambddi Surla.

(670-2a) **Grey Nightjar** *Caprimulgus indicus* Latham

(Jungle Nightjar, Indian Jungle Nightjar)

First reported by Saha and Dasgupta (1992), who collected a specimen at Mollem on 3rd January 1969 during one of their collecting trips to Goa for the Zoological Survey of India. They ascribed this and another specimen collected in April 1973 at Collem to the nominate race *C. i. indicus*. **Status**: An uncommon, locally common resident or dry season visitor from the coastal belt to the base of the Western Ghats. Occurs also on the crest of the Ghats. **Habitat**: Patches of remnant semi-evergreen forest on the slope and scrub and brushwood on the top of coastal and midland plateaus; open woodland in the midland region and on the crest of the Western Ghats; teak plantations and moist deciduous and light semi-evergreen forest at their base and outlying hills. **Sites**: Terakol (Pernem); Siolim, Nagoa valley, Baga hill, Assagao (Bardez); Mayem lake (Bicholim); Valpoi-Pali, Surla (Sattari); Farmagudi, Bondla WS (Ponda); Selaulim, Kalay, Mollem Tourist Complex, Tambdi Surla, Devil's Canyon (Sanguem); Cotigao WS (Canacona). **Seasonal status**: The absence of records from the monsoon-months of June, July and August suggests that this nightjar turns nomadic during the rains.

(676-7) **Jerdon's Nightjar** *Caprimulgus atripennis* Jerdon

(formerly Long-tailed Nightjar *Caprimulgus macrurus* Horsfield)

First reported by Grubh and Ali (1976), who collected a specimen at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. They identified the specimen as belonging to the then existing subspecies *C. macrurus atripennis*. **Status**: Unclear. This subcontinent endemic is presumably a scarce resident or winter visitor at the base and crest of the Western Ghats. **Habitat**: Moist deciduous and semi-evergreen forest at the base of the Ghats, patches of dense evergreen forest in hollows on rolling grassland at the crest. **Sites and sightings**: There are 10 records from 1997 through 2000 of up to eight birds by Beevers (1999), Bradshaw (*in litt.*), Duffield (2000), Holt (1998b), Lassey (2000), Santharam (*in* litt. 2000), Vermeulen (2000) and the author. Tambdi Surla with five records is the most favoured site followed by Bondla WS with two and Backwoods Camp, top of the Dudhsagar falls and Cotigao WS with one each. **Seasonal status**: All records date from late November to mid-February.

(682) **Savanna Nightjar *Caprimulgus affinis*** Horsfield

(Franklin's Nightjar, Allied Nightjar, *Caprimulgus monticolus*)

First reported by Saha and Dasgupta (1992), who collected a specimen at Poinguinim on 15th February 1978, during one of their ornithological collecting trips to Goa for the Zoological Survey of India. They ascribed it to the subspecies *C. a. monticola*). **Status**: Unclear. **Habitat**: The specimen collected by Saha and Dasgupta (1992) was found 'singly in thorny scrub by the side of a nullah near paddy cultivation' in or near the Cotigao WS. The bird seen by Frost (Lainer 1999b) was flushed from the ground in a tract of remnant semi-evergreen forest on the scarp of a plateau facing the coastal strip. **Sites and sightings**: Welland (2000) recorded one individual in the fields of Arpora-Baga on 16th December 1995. Frost (pers. comm.) observed a single bird, flushed by a dog, in the Nagoa valley on 13th December 1996. Marsh (1998) noted three birds in the Bondla WS on 6th February 1998.

COLUMBIDAE
Pigeons and Doves

(516-7) **Rock Pigeon *Columba livia*** Gmelin

(Rock Dove, Blue Rock Pigeon, Feral Pigeon, Feral Rock Dove)

First reported by Grubh and Ali (1976), who noted it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. Saha and Dasgupta (1992) collected a male specimen at Valpoi on 2nd March 1978 and ascribed it to the sub-species *C. l. intermedia*. **Status**: There is an abundant feral population that is resident and breeding in urban areas throughout the state. They are commonest in the coastal plain while smaller populations are found in many villages right up to the base of the Western Ghats. Flocks numbering up to 200 of what appear to be non-feral Rock Pigeons are found roosting during the southwest monsoon in coastal cliffs at Terakol and Cabo de Rama and throughout the year on the rocky islets off the coast at Bogmalo and at the *ersatz* cliff of the *ca*. 60 metres high dam at Anjunem. **Population**: Flocks of up to 300 feral birds are a fairly common sight. Wadsworth (1999) noted 600+ birds in dry paddy-fields of the coastal strip. **Breeding status**: The feral population breeds throughout the year. Nothing is known yet about the breeding places and period of the apparently non-feral population. **Seasonal status**: Feral Rock Pigeons are present throughout the year in more or less constant numbers, though there are marked seasonal short-distance movements related to the shifting growing seasons of the *rabi* and *vaingonn* rice-cultivation – the birds being heavily dependent on either freshly sown rice-paddies or stubble fields immediately after the harvest.

(521) **Nilgiri Wood Pigeon** *Columba elphinstonii* (Sykes)

First reported by Saha and Dasgupta (1992), who collected a male bird in the BMWS between Mollem and Collem on 3rd January 1969. **Status**: This Western Ghats endemic is a scarce, dry-season visitor to the Western Ghats, foothills to crest, and some untouched valleys where the plateaus of the midland region border the coastal strip or even the sea. **Habitat**: Restricted to very dense evergreen and semi-evergreen forest. **Sites and sightings**: There are a total of 33 sightings from Goa. The highest number of sightings by far is from the Bhagwan Mahavir WS (14) followed by the Nagoa valley (7) and Bondla WS (5). Other records are from the Arambol valley, the top of Dudhsagar falls and the Cotigao WS. **Population**: Up to 10 birds were seen on a single day – at Sunset point in the Bhagwan Mahavir WS on 3rd April 1997 (Sutton 1997). **Seasonal status**: Not yet recorded during the monsoon months June through September.

(530-3) **Oriental Turtle Dove** *Streptopelia orientalis* (Latham)

(Rufous Turtle Dove)

First reported by Grubh and Ali (1976), who noted it in the 'Mayem lake environs' and at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: Scarce and capriciously irregular dry season visitor to all three regions, from the hinterland of the seashore to the crest of the Western Ghats. The fact that this dove was not recorded in the years 1982, 1984, 1986, 1987, 1988, 1990 and 2000 points to the possibility of its just straying occasionally into Goa from the Deccan plateau where it is common. **Habitat**: Invariably found at cultivation – standing paddy as well as stubble fields. **Sites**: Surla (Sattari); Baga fields and hill, Candolim, Tivim-Damedem (Bardez); Mayem (Bicholim); Ciba-Geigy, Chorao, Cumbarjua canal (Tiswadi); Bhagwan Mahavir WS (Sanguem); Cotigao WS (Canacona). **Population**: All 19 sightings were of single birds or small groups of up to five except Holt's (1996a) record of 20 birds in arable fields beside the river in the Cotigao WS, on 3rd February 1996. **Seasonal status**: Recorded in all months except May and July through October.

(541) **Laughing Dove** *Streptopelia senegalensis* (Linn.)

(Palm Dove, Little Brown Dove, Senegal Dove)

First reported by Grubh and Ali (1976), who noted it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: Unclear. **Other sightings**: Claydon (1993) recorded an unspecified number of birds at Baga on 26th November 1993 and Lassey (2000) a single individual at Calangute on 16th January 2000.

(537-40) **Spotted Dove *Streptopelia chinensis*** (Scopoli)

First reported by Saha and Dasgupta (1992), who collected a specimen at Poinguinim on 24th December 1968. They were undecided whether to ascribe it to the Indian race *S. c. suratensis* or the Sri Lankan *S. c. ceylonensis* till more specimens were available for comparison. **Status**: An abundant breeding resident found singly, in pairs and loose parties from the coast to the lower slopes (up to *ca.* 150 metres) and on the crest of the Western Ghats. **Habitat**: Cultivated areas, palm groves, gardens, in and around settlements, mangroves lining rivers and creeks, deciduous and moist-deciduous forest, patches of remnant semi-evergreen forest and occasionally fairly dense semi-evergreen forest in the Western Ghats. **Breeding status**: Nest building was observed at the end of March. Immature birds are seen during most of the year. **Seasonal status**: Resident throughout the year without marked fluctuations in numbers.

(535-6) **Red Collared Dove *Streptopelia tranquebarica*** (Hermann)

(Red Turtle Dove)

First reported by Pitt (1995) who observed two birds at Baga on 1st January 1995. **Status**: Unclear. This species apparently strays sporadically into Goa from the Deccan plateau where it is fairly common and widespread. The Western Ghats might pose an almost insurmountable barrier to this bird of large tracts of open country and cultivation. **Sites and sightings**: There are 10 sightings of up to four birds at Baga and one each of two birds at Morjim and Tambdi Surla. **Observers**: Frost (pers. comm.), Hill (1995), Holt (1996a), Jännes (1998), Lynes (1999), Wadsworth (1999) and Woolley (1999). **Seasonal status**: All 10 sightings are from the cooler season, between 5th December and 9th February.

(534) **Eurasian Collared Dove *Streptopelia decaocto*** (Frivaldsky)

(Indian Ring Dove, Collared Dove, Collared Turtle Dove)

First reported by Saha and Dasgupta (1992), who collected a female specimen of the nominate *decaocto* at Poinguinim on 27th December 1968, during one of their collecting trips to Goa for the Zoological Survey of India. **Status**: An irregular and capricious dry-season visitor to the coastal belt and, exceptionally, the hilly midland region. **Habitat**: Almost invariably found perched on power lines over fallow rice-paddies and stubble fields or in leafless trees bordering such cultivated areas, occasionally in light woodland. **Sites**: Anjuna, Candolim, Nerul, Sinquerim (Bardez); Chorao, Pilar, Carambolim (Tiswadi); Cotigao WS (Canacona). **Population**: There are 19 sightings of up to 40+ birds though the majority of records are of singles and twos. **Seasonal status**: All sightings date from the three months between 20th November and 16th February except the one by Rane (1983), who claims to have noted it at Bondla WS sometime between 6th April and 22nd June.

(542-4a) **Emerald Dove** *Chalcophaps indica* (Linn.)

(Emerald Ground Dove, Bronze-winged Dove, Green-winged Pigeon, Common Emerald Dove)

First reported by Grubh and Ali (1976), who noted it at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A fairly common resident of the outlying hills, foothills, slopes and crest of the Western Ghats; uncommon resident and visitor of valleys and slopes in the midland region and coastal strip to about 2 kilometres from the seashore. **Habitat**: Evergreen, semi-evergreen and moist-deciduous forest, patches of remnant forest and fringes of well- wooded villages. **Sites**: Siolim, Tivim-Damodem, Arpora, Parra, Baga, Saligao, Sinquerim-Aguada (Bardez); Mayem lake (Bicholim); Valpoi (Sattari); Chorao (Tiswadi); Bondla WS (Ponda); Dharbandora, Bhagwan Mahavir WS, Neturlim (Sanguem); Cotigao WS, Gaodongrem (Canacona). **Population**: Harris (1998) counted 15 birds along the 18 kilometres long Anmod Ghat road between the entrance to the BMWS and Anmod (Karnataka), on 23rd December 1998. **Seasonal status**: Recorded throughout the year with near unvarying frequency.

(501-2) **Orange-breasted Green Pigeon** *Treron bicincta* (Jerdon)

(Orange-breasted Pigeon)

First reported by Saha and Dasgupta (1992), who collected a male bird at Poinguinim (Cotigao WS) on 10th February 1978. The specimen was tentatively identified as belonging to the nominate race though the measurements agreed more with the Sri Lankan subspecies *T. b. leggi*. **Status**: Uncertain; probably a scarce and very locally distributed resident or a roving winter visitor at the foot of the Western Ghats and in the midlands region westward to where it borders on the coastal belt. To Saha and Dasgupta (1992), in 1978, the Orange-breasted Green Pigeon did 'not appear to be a particularly common bird'. **Habitat**: Dense evergreen, semi-evergreen and patches of remnant semi-evergreen forest. **Sites and sightings**: Nagoa valley (Bardez) with one sighting, Mayem lake*** (Ponda), Bhagwan Mahavir WS** (Sanguem) and Cotigao WS* (Canacona) with three sightings each. **Observers**: van der Dol (1999, 2000), Frost (pers. comm.), Hill (1998a), Sykes (1999), Todd (2000), Tunturi (1998) and the author. **Population**: Seven of the existing of 10 records are of single birds, one of a pair and one each of 7 and *ca.* 20 birds (at the Mayem lake). **Breeding status**: Duffield (2000) reports having watched nest building by a pair at the Mayem lake on 19th February 2000. **Seasonal status**: All records are from the dry season, the earliest dating from 24th November, and the latest from 9th April.

(496-500) **Pompadour Green Pigeon *Treron pompadora*** (Gmelin)

(Grey-fronted Green Pigeon)

First reported by Saha and Dasgupta (1992), who collected a subadult male bird in the Bhagwan Mahavir WS on 3rd January 1969. They ascribed the specimen to the subspecies *T. p. affinis*. **Status**: A fairly common resident from sea level at the foot of coastal headlands through the midland region to the slopes and crest of the Western Ghats. **Habitat**: Dense evergreen, semi-evergreen and moist deciduous forest, well-wooded villages, scrubland with a sprinkling of fruit-bearing trees. **Population**: Flocks of 20-30 birds are a fairly common sight, the largest being of 50+. **Breeding status**: Holt (1998a) and Jännes (1998) noted breeding in the Bondla WS in February 1998. **Seasonal status**: This pigeon is either absent or very rare in the Western Ghats and its foothills in August, September and October. In the coastal belt it turns up in June-July, is most common in August, September and October only to slowly disappear towards December. The only records in the plains between December and June are four February sightings at Baga and Sinquerim (Holt 1998a).

(506-8a) **Green Imperial Pigeon *Ducula aenea*** (Linn.)

First reported by Prasad (1996), who noted it at the Bondla WS and Mollem in December 1995. **Status**: This shy and elusive pigeon is a scarce resident and/or visitor to the Western Ghats, from the foothills and outlying hills to the crest. **Habitat**: Restricted to dense and moderately dense evergreen forest and *sholas*. **Sites and sightings**: Cotigao WS (9 sightings), Bhagwan Mahavir WS (5), Bondla WS and Surla (one each). **Observers**: Frost (pers. comm.), Hill (1997), Lassey (2000), Willoughby (1997) and the author. **Seasonal status**: Most records are, as could be expected, from November through February, but four sightings in April and a single one in July suggest that this species might be a resident.

(510-12) **Mountain Imperial Pigeon *Ducula badia*** (Raffles)

(Imperial Pigeon, Maroon-backed Imperial Pigeon)

First reported by Grubh and Ali (1976), who noted it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. Saha and Dasgupta (1992) collected a female specimen of the race *D. b. cuprea* at Coduol on 28th February 1978. **Status**: An uncommon resident of the Western Ghats, from outlying hills and foothills to the crest, rare visitor to valleys on the scarp of plateaus facing the coastal strip. Saha and Dasgupta (1992) found this pigeon 'common, but not abundant' around Valpoi in 1978. **Habitat**: Dense and moderately dense contiguous evergreen forest. Exceptionally found in patches of remnant semi-evergreen forest. **Sites**: Coduol (Sattari); Nagoa valley (Bardez); Bondla WS (Ponda); Bhagwan Mahavir WS (Sanguem); Shri Chandreshwar hill (Quepem) and Cotigao WS (Canacona). **Population**: Usually seen in small groups, but flocks of up to 15

birds are not rare. The highest number recorded were 60+ birds descending during the late afternoon from the top of the Dudhsagar Falls into the valley at Sonaulim. **Seasonal status**: Recorded in all months except August.

RALLIDAE
Rails, Gallinules and Coots

(329-30) **Slaty-breasted Rail** ***Gallirallus striatus*** Linn.

(Blue-breasted Banded Rail, Banded Rail, *Rallus striatus*)

First recorded at the Baga creek on 21st February 1986. **Status**: An uncommon breeding resident of the coastal zone and river basins. **Habitat**: Mangrove-fringed creeks, reed beds, freshwater and saline marshes and flooded paddy-fields. **Sites**: Baga, Arpora, Calangute, Candolim (Bardez) and Calvim, Chorao-Tikanem, Cumbarjua canal, Neura, Ciba-Geigy, Divar-Navelim (Tiswadi). **Sightings**: Typically, 36 of the total of 52 sightings are by visiting birdwatchers and from Baga. **Breeding status**: A pair with four downy chicks was observed in saline grasses and sedges beside the wader scrape at Divar-Navelim on 20th August 2000 (Frost, Manville and the author). Generally, fully-grown (and locally reared?) juveniles appear to be seen just as frequently as adults. **Seasonal status**: Recorded in all months except June and September. This rail may possibly be subject to poorly understood and possibly local, monsoon-provoked movements as Davidson (1898) reported that it was 'common about Karwar (Karnataka, 14 kilometres south of Goa) in the rains...'

White-breasted Waterhen

(343-5) **White-breasted Waterhen** ***Amaurornis phoenicurus*** (Pennant)

First reported by Grubh and Ali (1976), who noted it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. Saha and Dasgupta (1992) collected a female specimen at Mollem on 20th February 1978 and ascribed it to the nominate race. **Status**: A common breeding resident from just behind the seashore through the midland region to the base and lower slopes of the Western Ghats and on their crest. **Habitat**: A wide variety of wetlands that provide cover higher than grass and sedges like mangrove-lined creeks, creeks, paddy cultivation with a fringe of dense bushes, *pandanus* clumps etc., also rivers in not too dense semi-evergreen forest. Towards the end of the dry season, in April and May, this rail is seen increasingly away from water. **Breeding status**: Downy chicks were noted between 29th August and 14th November, suggesting a protracted breeding season with probably two broods being raised. **Seasonal status**: Recorded in all months. The seemingly greater numbers found during the monsoon may be attributed to the birds being more noticeable by their noisy and fearless behaviour during courtship.

(337) **Baillon's Crake** ***Porzana pusilla*** (Pallas)

First recorded on 10th March 1981, when the author (1999a) was handed a specimen by children who had caught it (a disoriented migrant?) in a coconut-palm grove just behind the beach at Anjuna. **Status**: A scarce winter visitor in the coastal belt. **Sites and sightings**: Single specimens were observed at Baga (5 sightings) and Carambolim (1). **Observers**: Duffield (2000), Manners *et al.* (*fide* Holt), Prasad (1996), van der Dol (2000), Welland (2000) and the author. **Seasonal status**: All records are from the period between 7th November and 10th March.

(339-40) **Ruddy-breasted Crake** ***Porzana fusca*** (Linn.)

(Ruddy Crake, *Amaurornis fuscus*)

First recorded by the author (1999a) on 8th October 1987, when a single bird was spotted at the Baga creek. **Status**: Uncertain. Probably a scarce winter or dry season visitor in the coastal belt. **Habitat**: Freshwater marshes, saline creeks and rivers. **Sites and sightings**: Baga creek and marsh (14 sightings), Carambolim lake (1) and an unspecified site on the Mandovi river (1). **Observers**: Beevers (1999), Holt (1996a, 1999), Sykes (1999), van der Wielen (1998), Welland (2000), Willoughby (1996) and the author. **Population**: Among the 16 sightings are apparently three instances of the same bird having been observed two and three times, bringing down the number of observed birds to 12. All sightings were of single birds except one, which was of two birds. **Seasonal status**: All records are from the period between 8th October and 14th February.

(346) **Watercock** ***Gallicrex cinerea*** (Gmelin)

First recorded on 22nd June 1996, when two birds were observed at the Carambolim lake. **Status**: This reticent and crepuscular species is probably a scarce breeding visitor to the coastal belt. A marked discrepancy is apparent between the perceptions of visiting birders and the resident birdwatchers, i.e. Frost and the author. The ease and frequency with which the former tend to see the one or two Watercocks that are almost constantly present behind their hotels at Baga seems to lead them to the baseless assumption that these birds are a fairly common sight in Goa. **Habitat**: The Watercock occurs at a variety of freshwater wetland sites – reedy pools and lakes, marshes covered with sedges and occasionally in flooded paddy-fields. **Sites and sightings** (Frost's and the author's): Siolim-Gudem (two sightings), Candolim marsh (1), Santa Cruz paddy-fields (1), Carambolim lake (1), Batim pond (2) and Pilar pond (1). There is a veritable spate of sightings by visiting birdwatchers, nearly all of them at a single small marsh at Baga with a sprinkling of records from the Carambolim lake and paddy-fields, Santa Cruz paddy-fields and the ponds in the Ciba-Geigy compound. These records date from between 4th November and 20th February. **Population**: Most sightings are of singles and pairs. The largest group comprised two male and three female birds at the Carambolim lake, on 30th May 1999. **Breeding status**: Courtship ritual was observed during the last days of May and the first week of June. The curious lack of sightings between the end of June and mid-September could be an indication of breeding since the birds would then be at their most secretive. Male birds in full breeding plumage were observed in late May and throughout June. **Seasonal status**: Recorded in all seasons, though there appears to be a conspicuous gap in sightings between the end of February and the end of May. Watercocks probably turn nomadic in this period due to the drying up of many wetlands and the lack of sufficient emergent vegetation to provide cover.

(348-9) **Purple Swamphen** ***Porphyrio porphyrio*** (Linn.)

(Purple Gallinule, Purple Moorhen, *Porphyrio poliocephalus*)

First recorded at the Carambolim lake on 14th September 1988. **Status**: Birds are present, in dramatically fluctuating numbers, throughout the year. Primarily a common and very locally distributed dry season visitor to the coastal belt. Very small numbers breed almost throughout the year. **Habitat**: Freshwater ponds and lakes with a large extent of floating and rooted vegetation and waterlogged paddy-fields in the vicinity of such sites. **Sites**: Carambolim lake***, Carambolim paddy-fields, Ciba-Geigy, Goa Velha, Merces/Santa Cruz wetland, Pilar pond*, Neura, Talaulim, Santa Cruz paddy-fields (Tiswadi) and Curtorim and Macasana** tanks (Salcete). **Population and seasonal status**: Monthly maximum numbers at the Carambolim lake decline from a peak of over 1000 birds in January to a low of 100+ in May,

when this tank has shrunk to a puddle. With the onset of the monsoon rains, numbers rise to *ca*. 250 in June-July, only to sink to their lowest level of 50-80 birds in August through October. The influx of winter visitors in November and December brings in a fairly steady population of 500+ individuals. Yearly maximum numbers at the Carambolim lake, usually reached in January, were a fairly constant 400+ to 667+ for the period from 1989 to 2000. In the years 2001 and 2002, the maximum population rose to 997+ and 1076+ respectively. Maximum numbers counted at other sites were 31 birds on the Pilar pond on 4th September 1999, 20 at Ciba-Geigy on 29th April 2001 and 111 birds on the Macasana tank on 14th January 2001. **Breeding status**: The breeding season is protracted and ill defined as the following list shows: Incubation was noted in January, June and October at Carambolim lake, Pilar pond and Macasana tank. Downy chicks were observed in January, August, September, October and November at Carambolim lake and Pilar pond. Fledglings were seen in February, May, September and October at Carambolim lake and Pilar pond.

(347-7a) **Common Moorhen *Gallinula chloropus*** (Linn.)

(Moorhen, Common Gallinule, Indian Gallinule)

First recorded at a Calangute pond on 2nd March 1981. **Status**: A common winter visitor to water bodies in the coastal belt. **Habitat**: Freshwater lakes, tanks, ponds and marshes. **Sites**: Baga marsh, Calangute pond, Candolim, Sinquerim-Aguada marsh (Bardez), Carambolim lake***, Batim tank, Santa Cruz marsh, Ciba-Geigy ponds, Pilar pond (Tiswadi) and Velsao marsh, Utorda tank, Chandor lakes, Curtorim ** and Macasana tanks*, Velim tank (Salcete). **Population**: Numbers are fluctuating to a great degree but generally showing a downward trend. Mid-January population at Carambolim lake was 300+ in 1989, 80+ in 1990, 40+ in 1991, 200+ in 1996, 73 in 1999, 101 in 2001 and 25 in 2002. **Seasonal status**: Inward migration usually begins during the first days of October (earliest sighting: 13th September) and peaks towards the end of November, when numbers fluctuate erratically from year to year (1988: 30+, 1989: 200+, 1997: 1000+, 1998: 50+). In most years the majority (up to 75%) of the incoming birds are fledglings that are barely able to fly. This would suggest that they originate from close-by breeding grounds, possibly on the Deccan Plateau. Outward migration takes place from mid-February to mid-March (latest sighting: 6th April). **Breeding status**: The out-of-season sighting of two fully fledged juveniles each on 2nd May 1998 at the Pilar pond and 30th May 1999 at Carambolim lake makes local breeding probable but a clear-cut breeding record is still lacking.

(350) **Common Coot *Fulica atra*** Linn.

(European Coot, Eurasian Coot, Coot)

First reported by Grubh and Ali (1976), who noted it in North Goa during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A

common winter visitor to the coastal plain. **Habitat**: As for Common Moorhen; occasionally frequents saltpans. **Sites**: Parxem-Agarwaddo marsh (Pernem); Anjuna pond, Baga marsh and saltpans, Arpora saltpans, Pilerne tank (Bardez); Carambolim lake***, Goa Velha ponds, Santa Cruz wetlands, Pilar and Batim ponds, Neura wetlands (Tiswadi); Velsao wetlands, Chandor lakes, Utorda marsh, Curtorim, Macasana** and Velim tanks (Salcete). **Population**: The maximum numbers observed at Carambolim lake were 2000+ birds on 6th February 1989. Numbers tend to fluctuate erratically from year to year as the following mid-January counts show: 400+ in 1988, 1500+ in 1989, 150+ in 1990, 1500+ in 1996, 67 in 1999, 402 in 2001 and 24 in 2002. **Seasonal status**: The Common Coot usually arrives from mid-October onwards, sometimes from the beginning of November (earliest record: 28th September). Departure takes place from the end of March onwards and in many years the birds are absent by the first days of April (latest sighting: 16th June).

SCOLOPACIDAE

SCOLOPACINAE
Woodcocks and Snipes

(406) **Pintail Snipe** ***Gallinago stenura*** (Bonaparte)

First reported by Saha and Dasgupta (1992), who collected two specimens at Poinguinim on 15th February 1978, during one of their ornithological collecting trips to Goa for the Zoological survey of India. **Status**: A fairly common winter visitor to the coastal belt and river basins as well as the base of the Western Ghats. **Habitat**: Found at a variety of sites including freshwater and, rarely, saline marshes, pool edges and damp pasture land. Very partial to paddy-fields that are flooded and freshly plowed for the irrigated winter *vaingonn* crop. Occurs in drier areas such as stubble fields and tracts of abandoned cultivation more often than Common Snipe. **Sites**: Parxem-Agarwaddo marshes and fields (Pernem); Baga marsh and fields*, Candolim marsh and pastures, Siolim-Marna fields (Bardez); Carambolim grassland, Santa Cruz creek, Divar-Navelim (Tiswadi); Issorcim fields** (Marmagoa); Corgal fields in the Cotigao WS*** (Canacona). **Population**: Single figure day counts are the norm though higher estimates have included 30 in the Baga fields, 20 at the Candolim marsh, 25+ in the fields of Siolim-Marna and over 100 in the Corgal fields in the Cotigao WS. **Seasonal status**: Autumn influx begins around mid-October (earliest record: 4th September) and continues until the middle of November, when birds are occasionally flushed from very unsuitable habitat e.g. the rocky crest of Baga hill. The peak is reached in the second half of December. Most birds have departed by the end of March (latest record: 15th April).

(409) **Common Snipe *Gallinago gallinago*** (Linn.)

(Snipe, Fantail Snipe)

First recorded on 5th December 1985, when eight birds were observed in a marsh at Arpora-Baga. **Status**: A fairly common winter visitor to the coastal belt and river basins; scarcer in the midland region. **Habitat**: Frequents many of the same areas as the previous species, Pintail Snipe, but generally prefers wetter parts of the same habitat. **Sites**: Parxem-Agarwaddo*** (Pernem); Siolim-Gudem, Siolim Marna*, Arpora fields, Baga marsh, Candolim marsh, Sinquerim-Aguada marsh (Bardez); Santa Cruz fields and creek**, Carambolim lake, fields and grassland, Divar-Navelim, Neura wetlands, Ciba-Geigy (Tiswadi); Shiroda marsh, Goa Meat Complex (Ponda). **Distribution**: Not yet recorded south of the Zuari river. **Population**: As with the previous species, single figure day-counts are the norm though up to 20 birds are occasionally noted in the Baga fields, Candolim marsh and Carambolim grasslands. Larger assemblies of several hundred birds were observed at the Santa Cruz paddy-fields and creek and in the Parxem-Agarwaddo marsh. **Seasonal status**: Immigration starts in the first half of September (earliest record: 23rd August), peak numbers date from late November and mid-February and departure takes place until mid-April (latest record: 6th May).

(410) **Jack Snipe *Lymnocryptes minimus*** (Brünnich)

(*Gallinago minima, Capella minima*)

First recorded by the author (1999a) on 20th March 1988, when a single bird was flushed from standing paddy in the fields of Sonaulim, at the foot of the Dudhsagar waterfalls. **Status**: A very rare winter visitor to the coastal belt and the foothills of the Western Ghats. **Habitat**: Margins of paddy-fields – fallow or with standing paddy – and irrigation runnels. **Sites and sightings**: Single birds were seen in the paddy-fields of Baga on 7th February 1996 (Welland 2000), 24th November 1998 (van der Wielen 1998) and at Tambdi Surla on 4th December 1999 (Dennis 1999).

TRINGINAE

Godwits, Sandpipers, Curlews, Phalaropes etc.

(389-90) **Black-tailed Godwit *Limosa limosa*** (Linn.)

First recorded in the Baga paddy-fields on 12th November 1983. **Status**: A scarce but apparently annual winter visitor to the coastal belt and river basins. **Habitat**: Saline and freshwater marshes, flooded paddy-fields, saltpans and occasionally tidal mudflats. **Sites**: Chapora estuary, Baga fields (Bardez); mudflats between Divar and Chorao, Carambolim fields, Neura wetlands, Divar-Navelim, Santa Cruz fields and Agassaim mudflats (Tiswadi). **Population**: There are a total of 53 sightings of

up to 18 birds in a group, many of them multiple sightings of the same birds spending up to two weeks at the same site. **Seasonal status**: Recorded in all months except February, May and July. Arrival dates vary greatly from year to year but the second half of September appears to be the norm (earliest record: 31st August). Most sightings date from November followed by September, October and December. There are three records from the end of March and the beginning of April suggesting a sporadic spring migration. The record on 20th June 1999 must have been of a bird lingering on into the monsoon.

(391-1a) **Bar-tailed Godwit *Limosa lapponica*** (Linn.)

First recorded on 6th January 1985, when about a dozen birds were sighted at Chorao. **Status**: An uncommon but regular autumn passage migrant and, in much smaller numbers, winter visitor to the coastal belt and river basins that was absent only in 1997. **Habitat**: Estuarine mudflats, coastal beaches and, to a lesser extent, saline marshes. **Sites**: Terakol river, Morjim and Mandrem beach (Pernem); Chapora estuary (Bardez); Chorao-Divar mudflats, Divar-Navelim, Miramar beach and Panaji-Ribandar saltpans (Tiswadi) and Sal estuary (Salcete). **Population**: Out of altogether 42 sightings, singles with 7 sightings and pairs with 11 appear to be the rule. Groups of 12 and 15 birds have been recorded twice and once respectively. **Seasonal status**: Autumn passage migration usually gets under way during the first September week (earliest record: 24th August) and lasts into November, with the largest group sizes and the most sightings in September and October. Groups of birds tend to stay on sometimes for weeks in the same locality, e.g. 4-6 birds in the Chapora estuary from 5th September to 24th October. Only a few birds are present during the winter months. Spring migration is absent (only a single bird was observed, on 6th May) suggesting that the birds return by another route. There are no records from June and July.

(385-6) **Whimbrel *Numenius phaeopus*** (Linn.)

First recorded on 20th December 1980, when three birds were seen on the coast at Velsao. **Status**: A fairly common autumn passage migrant and less common winter visitor in the coastal belt and river basins. **Habitat**: The Whimbrel is found at rocky headlands, coastal beaches, river estuaries, tidal mudflats and saline marshes, occasionally brackish pools and, rarely, irrigated paddy-fields. During autumn migration it is frequently seen flying low along the surf-line or a few hundred metres offshore. **Population**: Singles with 26 sightings and twos with 13 are the most common. The largest numbers (16, 24, 63, 70, 83) were counted during August 2000 at the saline marshes and mudflats of Divar-Navelim and over 130 birds were estimated to be present at the same site on 22nd July 2000. **Seasonal status**: This species is the earliest wader to arrive in Goa, usually towards the end of July, at the height of the southwest monsoon, and one of the earliest to leave, normally in

February, though a few birds may linger on into March and even April. The exceptional record of seven birds at Divar-Navelim on 20th June 1998 could be either an extremely early arrival or a case of non-breeding birds over-summering in their winter quarters. The Whimbrel was recorded in all months. There is a distinct autumn passage with the highest number of sightings in August and September. Relatively few birds are present during the winter months. No spring passage was noticed.

(387-8) **Eurasian Curlew** ***Numenius arquata*** (Linn.)

(Curlew)

First recorded on 30th August 1982 at the Chapora estuary. **Status**: A fairly common autumn passage migrant and widespread winter visitor in the coastal belt and river basins. **Habitat**: Coastal beaches, tidal mudflats in river estuaries, saline and freshwater marshes. **Population**: Most records are of ones and twos and group sizes of up to 15 birds are fairly common. The largest flocks, of 30 and 34 birds, were seen during autumn passage in September-October. **Seasonal status**: Recorded in all months except June and July. Autumn influx and passage begins in August (earliest record: 7th), peaks in October and slackens in November. The wintering population is at its lowest ebb in December and February. Return migration reaches a moderate peak in March while in April and May only a few lingerers are present (latest sighting: 7th May).

(392) **Spotted Redshank** ***Tringa erythropus*** (Pallas)

First recorded on 3rd January 1996, when six birds were observed in the Carambolim paddy-fields. **Status**: A casual winter and/or dry season visitor to wetlands and water bodies of the coastal belt and river basins. There are altogether only 22 records from Goa. **Habitat**: Saltpans, saline and freshwater marshes, lakes and ponds, soggy paddy-fields. **Sites**: Morjim marsh (Pernem); Baga saltpans, Candolim marsh, Nerul saltpans, Sinquerim-Aguada marsh (Bardez); Carambolim lake and paddy-fields, Ciba-Geigy ponds, Neura wetlands, Santa Cruz paddy-fields, Panaji saltpans, Chorao (Tiswadi). **Population**: Low single-digit group sizes are the norm though flocks of 17 and 20 individuals have been recorded. **Seasonal status**: The first individuals of this late arriving visitor show up at the tail end of November (earliest record: 23rd). Numbers and sightings peak in February and by the end of April the last birds, often already in full breeding plumage, have moved out (latest record: 5th May).

(396) **Common Redshank** ***Tringa totanus*** (Linn.)

(Redshank)

First recorded on 1st March 1983 in the estuary of the Terakol river. **Status**: A very common dry season visitor and uncommon oversummerer in the coastal belt. **Habi-**

tat: Estuaries and, rarely, beaches, tidal mudflats, saline and freshwater marshes, pools, fish and shrimp ponds, irrigated paddy-fields and saltpans. **Population**: Typical day counts throughout the dry season are of up to 25 individuals. During inward migration, tidal mudflats are typically the feeding ground for 100-250 birds. Irrigated paddy-fields that are freshly plowed or sown for the winter *vaingonn* crop appear to exert the greatest attraction to Common Redshanks: a 0.5 sq.km stretch of paddy-fields frequently holds up to 500 birds. **Seasonal status**: Recorded throughout the year. Inward migration and passage begins in August and reaches its peak in September. The wintering population, after a short slump in October, reaches its high in November and gradually diminishes towards March. Flocks of up to 58 birds frequently though not regularly hang on through the hot season (April, May) and the monsoon months June and July.

(395) **Marsh Sandpiper** ***Tringa stagnatilis*** (Bechstein)

First recorded in flooded paddy-fields at Baga on 14th November 1985. **Status**: A scarce winter visitor and fairly common spring passage migrant exclusively in the coastal belt. **Habitat**: Saltpans, tidal mudflats, saline and freshwater pools and marshes, fish and shrimp ponds and irrigated paddy-fields. **Sites**: Parxem-Agarwaddo (Pernem); Chapora estuary, Baga saltpans and paddy-fields, Siolim-Gudem marsh, Candolim marsh (Bardez); Chorao, Divar-Chorao mudflats, Divar Navelim, Panaji saltpans, Carambolim lake, Ciba-Geigy ponds, Neura wetlands, Santa Cruz paddy-fields and creek (Tiswadi); Shiroda paddy-fields (Ponda); Mobor (Salcete). **Population**: This wader is usually encountered singly or in groups of up to eight birds. An exceptional group size of 25 individuals at a single wetland was observed on 3rd February 1989, apparently at the very beginning of the spring passage migration. **Seasonal status**: Recorded throughout the year except in June and July. The winter visitors make their appearance towards the end of August (earliest record: 19th) and disappear in April (latest record: 6th May). There are indications that a spring passage migration takes place in late February and throughout March.

(396) **Common Greenshank** ***Tringa nebularia*** (Gunner)

(Greenshank)

First recorded on 18th January 1981 in saltpans at Arpora-Baga. **Status**: A common winter and dry season visitor to the coastal belt, scarce in the midland region and at the base of the Western Ghats; a scarce, but almost annual, over-summering visitor in the coastal belt. **Habitat**: Estuaries, tidal mudflats, saltpans, creeks, both saline and freshwater pools and marshes, fish and shrimp ponds and irrigated paddy-fields. **Sites other than in the coastal belt**: Pirna, Tivim-Damedem (Bardez), Shiroda wetlands and paddy-fields (Ponda) and Collem paddy-fields and the mine-pit between Mollem and Collem (Sanguem). **Population**: Records of singles, twos and threes are predominant though loose flocks of up to 50 birds are not rare. The

largest congregation observed was of 120 individuals. **Seasonal status**: Recorded in all months. Immigration usually begins around mid-August and lasts until the end of September. The wintering population reaches peaks in November and January while return migration takes place in May. Almost annually small numbers (groups of up to 6 birds) stay on during the southwest monsoon.

(397) **Green Sandpiper *Tringa ochropus*** Linn.

First reported by Saha and Dasgupta (1992), who collected one specimen each at the Aravali hills near Valpoi on 12th January 1969 and at Mollem on 3rd April 1973. **Status**: A widespread winter visitor, fairly common in the coastal belt, scarcer and more local inland but with records extending to the base of the Western Ghats. **Habitat**: Occurs in a variety of primarily freshwater sites that include pools, marshes and ditches, the banks of small rivers and streams (even in evergreen and semi-evergreen forest), irrigated paddy-fields as well as saltpans, fish and shrimp ponds etc. **Unusual sites**: Mayem lake near Bicholim, Khandepar river above and below Collem, paddy-fields of Sonaulim at the foot of Dudhsagar waterfalls (BMWS) and Collem paddy-fields in Sanguem, Tirval and Corgal paddy-fields (Cotigao WS) in Canacona. **Population**: This reclusive wader is usually encountered singly. Normal dry season day counts are in the range of 5-15 birds but occasionally up to 30 have been counted in one day. **Seasonal status**: Recorded in all months except May and June. Autumn influx starts in the first half of September, though occasionally single birds are heard migrating at night in August and even July (earliest record: 20th). The peak population is reached during the winter *vaingonn* paddy-season, late November to early February. Numbers decline during February and by March-end most birds have left (latest record: 18th April).

(398) **Wood Sandpiper *Tringa glareola*** Linn.

(Spotted Sandpiper)

First recorded in paddy-fields at Velsao on 2nd January 1981. **Status**: A very common and locally abundant winter and dry season visitor to the coastal belt, scarce at the base and on the crest of the Western Ghats. Undoubtedly the commonest wintering wader in Goa. **Habitat**: Occurs in a wide variety of wetland sites that includes saltpans, both saline and freshwater lakes, pools and marshes, fish and shrimp ponds, damp grassland and, rarely, beaches and estuarine mudflats. Invariably, the largest numbers are found in freshly plowed, irrigated paddy-fields in the winter *vaingonn* season (end of November, December, beginning of January). **Sites and population**: Favourite sites include flooded paddy-fields at Parxem-Agarwaddo with 2000+ birds on 2nd February 1984 and 19th January 1985, Shiroda with 500+ regularly, Santa Cruz with up to 400 birds and Carambolim with regularly up to 200+ birds. **Unusual sites**: Surla, Collem and Corgal paddy-fields. **Seasonal status**: Recorded throughout the year. Immigration usually begins during the first week

of September and numbers increase slowly until mid-November. A large population is present in December and January at irrigated paddy-fields, either freshly plowed, just transplanted or with standing paddy, during the winter *vaingonn*-growing season. There is a low peak in May during the not very marked spring return migration. Staying on of a few birds during the southwest monsoon is very rare.

(400) **Terek Sandpiper *Xenus cinerea*** (Latham)

(Tringa terek, Tringa cinerea)

First recorded at Velsao beach on 20th September 1980. **Status**: A fairly common winter and dry season visitor exclusively to the coastal belt and river basins. **Habitat**: Coastal and riparian beaches, tidal estuaries and saline marshes; less regularly encountered at rocky headlands, saline pools and freshwater marshes. **Sites**: Terakol estuary, Mandrem and Morjim beach, Parxem-Agarwaddo marshes (Pernem); Chapora estuary*, Siolim, Baga paddy-fields, Candolim, Nerul creek, Sinquerim-Aguada marsh (Bardez); Chorao, Chorao-Divar mudflats**, Divar-Navelim, Panaji saltpans, Santa Cruz creek, Agassaim mudflats*** (Tiswadi); Velsao beach (Marmagoa). **Population**: Usually encountered in ones and twos, with groups of up to 10 birds being fairly common. Flocks of over 10 individuals were noted at Parxem-Agarwaddo (18), Morjim beach (40), Divar-Navelim (18), Chorao-Divar mudflats (40+), Chapora estuary (21) and Agassaim mudflats (48). **Seasonal status**: Recorded in all months except July. The winter visitors start arriving in mid-August (earliest record: 5th), followed by a moderate autumn passage in September-October. The wintering population is highest in January-February and dwindles until an even more moderate spring passage in May and early June brings the season to a conclusion (latest record: 20th).

(401) **Common Sandpiper *Actitis hypoleucos*** (Linn.)

(Tringa hypoleucos)

First reported by Saha and Dasgupta (1992), who collected one bird at Mollem on 24th February 1978. **Status**: A very common, almost ubiquitous but not abundant winter and dry season visitor throughout almost the entire state. Totally absent only from the mid- and higher elevations of the Western Ghats. **Habitat**: Headlands, rocky seashore, beaches, tidal mudflats, rivers and creeks, freshwater lakes, ponds, rivers and streams, both saline and freshwater marshes, damp grassland, rivers and streams in moist deciduous and semi-evergreen forest. **Population**: In the coastal belt, day counts occasionally exceed 40 birds and individual sites can harbour nearly as many individuals e.g. 38 in the shrimp pond/ferry jetty area on Chorao on 8th December 1996, more than 20 at Keri beach on 25th November 1999 (Holt 1999), 75 at Chorao on 12th January 1999 (Lassey 1999) and 35 at Mandrem beach on 10th February 2000 (Duffield 2000). **Seasonal status**: Recorded in all months except June. The Common Sandpiper usually arrives at the beginning of August, occasionally at the end of

July (earliest sighting: 25th). Departure is protracted and ends in most years during the first half of May (latest record: 29th May).

(402) **Ruddy Turnstone** ***Arenaria interpres*** (Linn.)

(Turnstone)

First recorded on 12th September 1982, when *ca.* 10 birds were seen at Morjim beach. **Status**: An uncommon autumn passage migrant and scarce winter visitor in the coastal belt. **Habitat**: Coastal beaches, tidal mudflats, saltpans and freshwater reservoirs with pebble-strewn shores. **Sites**: Keri and Morjim beach (Pernem); Chapora estuary*, Calangute-Candolim beach, Fort Aguada (Bardez); Divar-Navelim, Panaji saltpans, Dona Paula (Tiswadi); ZAC reservoir** (Marmagoa); Majorda beach (Salcete); Palolem beach (Canacona). **Population**: Usually encountered in singles and pairs. Groups of more than four birds are rare; the largest flock consisted of 10 individuals. **Seasonal status**: Recorded in all months except June and July. Inward and passage migration gets under way at the end of August (earliest record: 20th) and peaks throughout September. The small wintering population shows a gradual decline towards April and the last birds disappear during the first week of May (latest: 6th). There is no pronounced outward migration. **Plumage**: Birds seen in May and August are either in full or partial breeding plumage.

(413) **Great Knot** ***Calidris tenuirostris*** (Horsfield)

(Eastern Knot, Asiatic Knot)

First reported on 16th November 1986, when nine individuals were observed at Morjim beach. **Status**: A casual autumn passage migrant and rare winter visitor to the coastal belt. Not yet recorded in South Goa. **Habitat**: Strictly confined to coastal beaches, estuaries and tidal mudflats. **Sites and sightings**: Mandrem beach, Morjim beach** (Pernem); Chapora estuary***, Candolim beach (Bardez); Chorao, Chorao-Divar mudflats, Divar-Navelim, Santa Cruz pool, Agassaim mudflats* (Tiswadi). **Observers**: Frost, Gregory (1999), Hill (1997), Holt (1997, 1998b), Prasad, van der Wielen (1998), Willoughby (1997) and the author. **Seasonal status**: Not yet recorded from April through July. In August, September and October, precursors of a November passage migration are seen (earliest record: 19th August). There are only a few sporadic sightings during the winter months (latest record: 14th March).

(414) **Sanderling** ***Calidris alba*** (Pallas)

First recorded on 28th October 1982 at Morjim beach. **Status**: An uncommon autumn passage migrant and winter visitor in the coastal belt. **Habitat**: Sandy beaches and estuarine mudflats, rarely saline marshes in inland estuaries. **Sites**: Morjim beach, Agarwaddo marshes (Pernem); Chapora estuary (Bardez); Miramar beach, Divar-Navelim, Chorao-Divar mudflats (Tiswadi); Velsao beach (Marmagoa). **Population**:

Though numbers vary from year to year, a gradual decline in the passage and wintering population is noticeable. Flocks of two-digit strength were the rule in the eighties and there were two instances, in 1983 and 1986, of flocks of over 100 and 120 birds. During the nineties, despite a multitude of observers, group size rarely exceeded single digit numbers. **Seasonal status**: Not recorded from April through July. Autumn influx is observed throughout September (earliest record: 17th August). The wintering population reaches its peak in January and declines rapidly in February (latest sighting: 24th March).

(416) **Little Stint** *Calidris minuta* (Leisler)

First recorded on 2nd March 1982 at Baga. **Status**: A common autumn passage migrant and winter visitor to the coastal belt. **Habitat**: Essentially the same variety of wetlands as Wood Sandpiper. **Population**: Groups of single-digit strength are predominant, but larger congregations are fairly common. Flocks of over 50 individuals have been observed at Parxem-Agarwaddo (100+), Baga saltpans (50+), Chorao (75), Divar-Navelim (164+), St. Cruz paddies (200+), Panaji saltpans (280), Carambolim-Daddo (200+), Carambolim paddies (75), Neura wetlands (145+), Shiroda wetlands (100+) and Velsao beach (100+). **Seasonal status**: Recorded in all months except June and July. The first inward migrants appear in the first half of August (earliest record: 3rd) while the bulk of the birds arrives or passes through during September. Return migration starts in April and comes to an end during the first half of May (latest record: 18th).

(415) **Red-necked Stint** *Calidris ruficollis* (Pallas)

(Eastern Little Stint, Rufous-necked Stint)

First reported by Frost and Lainer (2002), who observed a single bird among *ca.* 1000 waders on tidal mudflats towards the western end of Divar island on 13th September 1999. **Status**: Unclear. Possibly an erratic winter visitor. **Habitat**: As for Little Stint. **Other sightings**: On 3rd August 2000 the same observers spotted two birds in worn, fading summer plumage at the same site. Presumably the same birds were still present on 15th August 2000. In the freshly plowed paddy-fields near the ferry jetty of Shiroda a single bird was seen together with Little, Temminck's and Long-toed Stints on 13th December 2000. On 17th January 2001 two individuals were observed at the original Divar-Navelim site. **Remarks**: The Red-necked Stint is described as a winter visitor, 'an eastern form apparently not uncommon along shores of Bay of Bengal in the Kolkata region. Recorded also from Orissa (Chilka L.), Tamil Nadu (Rameswaram I.) and the Andaman and Nicobar Is. Not in W. India or Sri Lanka.' (Ripley 1982). The five sightings in Goa are the first records on India's West Coast.

(417) **Temminck's Stint** *Calidris temminckii* (Leisler)

First recorded on 8th January 1981 on tidal mudflats at Cortalim. **Status**: A fairly common winter visitor to the coastal belt and river basins. **Habitat**: Freshly plowed or sown paddy-fields are favoured; also found at freshwater and occasionally saline pools and marshes, saltpans and fish and shrimp ponds. **Favourite sites** include Santa Cruz paddy-fields with 423 birds in 10 sightings and flocks of up to *ca.* 200, Parxem-Agarwaddo marshes and paddy-fields with 204 birds in 12 sightings and flocks of 50+ and *ca.* 100 and Baga saltpans and fields with 98 birds in 18 sightings and groups of up to 25. **Population**: Singles and groups of up to six birds appear to the most common though flocks of up to 50 birds were occasionally seen. The largest flock consisted of about 200 individuals. **Seasonal status**: Recorded throughout the year except in the monsoon months of June, July and August. This stint is a latecomer, usually arriving in numbers only in November (earliest sighting: 9th September). After a peak in January numbers decline until all birds have left by the end of April (latest record: 2nd May).

(418) **Long-toed Stint** *Calidris subminuta* (Middendorff)

First reported by Mullarney (*fide* Holt 1997), who observed three birds in flooded paddy-fields beside Carambolim lake on 2nd December 1997. **Status**: A rare, but possibly annual, winter visitor to the coastal belt and river basins. **Habitat**: Irrigated paddy-fields that are under the plow for the winter *vaingonn* crop and, once only, saltpans. **Sites and sightings**: The paddy-fields adjacent to Carambolim lake and the Santa Cruz paddies appear to be equally favoured with three records each. Single sightings are reported from paddy-fields at Shiroda and from saltpans between Panaji and Ribandar. **Observers**: Frost (pers. comm.), Holt (1997, 1999), Lassey (2000) and the author. **Population**: Up to four birds were seen on six occasions while 7 and 8 individuals were counted once each. **Seasonal status**: All records fall into the period between 10th November and 29th April.

(420-1) **Dunlin** *Calidris alpina* (Linn.)

First recorded on 18th November 1983 when a group of 10 birds was observed at Morjim beach. **Status**: An uncommon autumn passage migrant and winter visitor in the coastal belt. **Habitat**: Coastal beaches, tidal mudflats, saline and occasionally freshwater pools and marshes, saltpans and irrigated paddy-fields. **Sites**: Terakol estuary, Arambol beach, Morjim beach***, Parxem-Agarwaddo marsh (Pernem); Chapora estuary, Arpora saltpans, Chapora estuary (Bardez); Divar-Navelim*, Divar-Piedade, Divar-Chorao mudflats, Chorao, Neura wetlands, Santa Cruz creek and paddy-fields**, Agassaim mudflats, Ciba-Geigy, (Tiswadi); Velsao beach (Marmagoa); Shiroda marsh and paddy-fields, Madkai mudflats (Ponda). **Population**: The majority of sightings is of singles and twos, but groups of up to a dozen individuals appear to be fairly common. The largest flocks consisted of 20, 22, 30

and 40 birds. **Seasonal status**: Not yet recorded in April, May, June and July. The vanguard arrives in August (earliest record: 5th), followed by a marked passage migration that lasts through September into October. The relatively few winter visitors slowly disappear in February (latest record: 8th March). An unseasonal record dates from 20th June.

(422) **Curlew Sandpiper** ***Calidris ferruginea*** (Pallas)

(*Calidris testacea*)

First recorded in the Parxem-Agarwaddo marshes on 9th April 1983. **Status**: A fairly common autumn passage migrant and scarce winter visitor in the coastal belt. **Habitat**: Coastal beaches, estuarine mudflats, saltpans, saline as well as freshwater marshes, saline pools, fish and shrimp ponds. **Sites**: Morjim beach*, Parxem-Agarwaddo marsh and paddies (Pernem); Chapora estuary, Nerul saltpans and marsh, Candolim fishponds, Baga paddy-fields (Bardez); Chorao, Divar-Navelim***, Divar-Piedade, Santa Cruz paddies and creek**, Panaji saltpans, Miramar beach, Neura wetlands, Agassaim mudflats (Tiswadi). **Population**: Sightings of singles and groups in single-digit numbers are commonest. Flocks of 25, 35, 40, 60 and 100 birds have been recorded once each and flocks of 80 twice. **Seasonal status**: Recorded throughout the year. Influx of autumn passage migrants starts at the beginning of August. September and, to a lesser degree, October see an impressive passage migration with flocks of up to 100+ birds. The wintering population is very small. There is no noticeable return migration. Non-breeding birds occasionally stay through the hot season and the southwest monsoon singly or in twos and threes.

(424-5) **Broad-billed Sandpiper** ***Limicola falcinellus*** (Pontoppidan)

First reported by Willoughby (1993), who observed one bird at Sinquerim on 18th March 1993. **Status**: Uncommon, but annual autumn passage migrant and scarce winter visitor in the coastal belt. **Habitat**: Riverine beaches, estuarine mudflats, saltpans, saline ponds and marshes, irrigated paddy-fields. Generally appears to favour a saline environment. **Sites**: Chapora estuary, Candolim fishponds, Sinquerim-Aguada saltpans (Bardez); Chorao*, Divar-Navelim***, Divar-Piedade, Santa Cruz creek**, Panaji saltpans, Miramar beach (Tiswadi). **Population**: Sightings of singles and groups of up to 9 birds are the norm though there are single instances of flocks consisting of 12, 13, 14, 16, 18, 19 and 35 individuals. The largest flocks were encountered consistently at the tidal mudflats of Divar-Navelim. **Seasonal status**: Recorded in all months except April through July. After an incoming trickle in August (earliest record: 3rd) a marked passage migration is noted throughout September with flock sizes up to 35+ individuals. Thereafter numbers drop sharply (the surprisingly high number of November sightings probably reflects only the high density of observers during this month) until the last birds have left by mid-March (latest record: 18th).

(426) **Ruff *Philomachus pugnax*** (Linn.)

(Ruff and Reeve)

First recorded at Parxem-Agarwaddo on 8th November 1983. **Status**: An uncommon winter visitor to the coastal belt. **Habitat**: Salt marshes, saltpans, brackish pools and freshly plowed or sown irrigated paddy-fields and, in one instance, coastal beaches. **Sites**: Parxem-Agarwaddo marshes and paddies* (Pernem); Baga fields (Bardez); Chorao, Divar-Navelim, Carambolim lake, paddies** and grasslands, Old Goa marsh, Neura wetlands***, Santa Cruz paddies (Tiswadi); ZAC reservoir (Marmagoa); Shiroda marsh (Ponda). **Population**: Groups of up to 20 birds are normal while flocks of 22, 24, 25, 35, 37 and 40 individuals have been counted once each. **Seasonal status**: Inward migration gets under way in September (earliest record, of a male with remnants of breeding plumage: 9th August) while return migration closes during the first week of March (latest: 8th).

ROSTRATULIDAE
Painted-Snipes

(429) **Greater Painted-Snipe *Rostratula benghalensis*** (Linn.)

(Painted Snipe)

First recorded in the Parxem-Agarwaddo marshes on 28th February 1988. **Status**: Poorly known due to the very shy, primarily crepuscular, and perhaps even nocturnal nature of this species. Probably an uncommon and very locally distributed breeding resident of the coastal belt. Not yet recorded in South Goa. **Habitat**: Freshwater and, to a lesser extent, saline and brackish marshes, ponds, pools and ditches and irrigated paddy-fields, providing that they have adjacent areas of dense cover for the birds to roost in during the day. **Sites**: Parxem-Agarwaddo marshes (Pernem); Siolim-Marna paddies, Siolim-Gudem marsh, Baga marsh ***, Candolim marsh*, Nerul marsh, Pilerne pond (Bardez); Divar-Navelim, Carambolim wetlands**, Santa Cruz paddies (Tiswadi). **Population**: At the marsh behind the Hotel Beira Mar at Arpora-Baga where this species is normally dependably present, typical counts are between 4 and 15 individuals in February. **Seasonal status**: Recorded throughout the year except during the monsoon months July and August. **Breeding status**: Four less than a week old chicks were observed in the Siolim-Marna paddies on 8th November 1999. Holt (1998b) saw family parties with two and four recently fledged chicks at the Baga marsh from 16th November 1998 onwards **Remarks**: At the Baga marsh birds do not usually appear from their daytime roosts until right at dusk when the light has already faded. The number of birds present varies dramatically from one evening to the next, and is perhaps more a reflection of the time they

leave the roost rather than a real indication of the number of birds present (Holt 2000). The majority of sightings are of the duller male.

JACANIDAE
Jaçanas

(358) **Pheasant-tailed Jaçana** ***Hydrophasianus chirurgus*** (Scopoli)

First recorded on 3rd January 1983, when 10 birds were observed in a marsh at Velsao. **Status**: Uncommon, locally common, irregular breeding resident in the coastal belt. **Habitat**: Freshwater pools, ponds, tanks and marshes with floating as well as emergent aquatic vegetation for cover; occasionally found in flooded paddy-fields, saline pools and saltpans. **Sites**: Paliyem marsh, Parxem-Agarwaddo marsh (Pernem); Arpora saltpans, Gudem marsh, Calangute Bhavani Tali, Siolim-Marna marsh, Pilerne pond, Candolim marsh (Bardez); Pilar pond**, Carambolim lake and paddy-fields***, Merces-Vaddi tank*, Santa Cruz tank, Batim tank, Goa Velha, Panaji pond, Bambolim lake (Tiswadi); Velsao tank (Marmagoa); Utorda tank, Chandor, Curtorim tanks, Macasana-Maem Todi, Velim tank (Salcete). **Population and seasonal status**: Population at Carambolim lake is highest in January (up to 600 birds in 1993) and declines until April to about 50 individuals. In May, when the water level has sunk too low to support the cover-providing emergent vegetation, the last birds disappear unless a plentiful previous monsoon has made a more liberal water management possible. The monsoon months June, July and August see only single and low two-digit numbers (up to 100 in 1996) until, in September, the winter visitors and the few breeding birds return. The highest numbers ever were a thousand or more birds present in September-October 1989. In general, the population shows a downward trend, possibly a reflection of an ongoing change in the plant cover: in recent years, the obnoxious South American aquatic weed *Salvinia molesta* has invaded the tank (and others as well) and occupied ever increasing areas by displacing other floating vegetation, like water lilies, and the sedge-like emergent vegetation thereby depriving the Pheasant-tailed Jaçana of much of the cover and, possibly, food sources. **Breeding status**: Breeding is irregular and usually by only one or two pairs. It was noted in 1988, 1989, 1996 and 1997, and only at the Carambolim lake and Pilar pond. 1988 was an exceptional breeding year for this species. On 2nd October a good number of downy chicks were observed at Carambolim lake and of the over 1000 birds present on 20th October more than 400 were juveniles still unable to fly, *i.e.* over a hundred pairs must have bred on this tank that covers only *ca.* 0.5 sq.km. Breeding season appears to be August-September. Half-grown downy chicks are seen around the end of September and beginning of October while not yet fully fledged youngsters are observed until the end of November. **Seasonal plumages**: Non-breeding plumage is seen from November to May, breed-

ing plumage from May to October and moulting has been noted in May-June and October.

(359) **Bronze-winged Jaçana *Metopidius indicus*** (Latham)

First recorded at Utorda on 15th November 1987. **Status**: An uncommon, locally common, breeding resident and, apparently, hot season visitor in the coastal belt; generally more numerous than Pheasant-tailed Jaçana for most of the year. **Habitat**: This species has very much the same habitat requirements as the Pheasant-tailed Jaçana but is less dependent on emergent aquatic vegetation and is very rarely found at saline or brackish water bodies. **Sites**: Siolim-Marna marsh, Arpora saline pools, Pilerne pond (Bardez); Pilar pond, Carambolim lake and paddies***, Batim and Merces tanks, Santa Cruz wetlands, Ciba-Geigy ponds, Neura wetlands, pond at Panaji, Goa Velha and Bambolim tank (Tiswadi); Utorda, Orlim, Velim, Curtorim and Macasana tanks (Salcete). **Population and seasonal status**: The wintering population, probably augmented by passage migrants and/or birds displaced from drying-out wetlands, reaches its peak of 100-200 birds variously in March, April and, even, May. Only a small breeding population of less than 50 individuals stays on during the southwest monsoon and the following months. The winter visitors apparently return only in December. The slight increase in numbers, discernible over the span of the last 11 years, has possibly much to do with the vegetational changes (mentioned in the corresponding chapter under Pheasant-tailed Jaçana), since the Bronze-winged Jaçana appears to be more dependent on floating and less on emergent vegetation than its congener. **Breeding status**: Breeding was recorded at Carambolim***, Pilar**, Curtorim, Macasana*, Orlim and Velim. There appear to be two breeding seasons, the major one in August-September and a minor one in February-March.

BURHINIDAE
Thick-knees

(435-6) **Eurasian Thick-knee *Burhinus oedicnemus*** (Linn.)
(Stone Curlew, Northern Stonecurlew, Stone-curlew)

First recorded by the author (1999a) on 27th September 1981 when a single bird was observed on a plateau between Arpora, Parra and Verla-Canca. **Status**: Uncertain. Probably a rare and, due to its shy and crepuscular nature, often overlooked winter visitor mainly to the eastern rim of the coastal belt where it borders on to the midland plateaus. **Habitat**: Grassy lateritic plateaus with either plantations of Australian acacias or a sprinkling of cashew bushes, dry stubble fields and banks of creeks. **Sites and sightings**: Arpora/Parra/Verla-Canca plateau (three sightings), Baga fields and creek (2) and Saligao plateau (1). All sightings are from Bardez taluka in North Goa. **Observers**: Dennis (1999), Frost (pers. comm.), Ransdale (1998), Welland

(2000) and the author. **Population**: Four sightings were of single birds and one each of two, four and six individuals. **Seasonal status**: Recorded in September, December and January.

(437) **Great Thick-knee *Burhinus recurvirostris*** (Vieillot)

(Great Stone Plover, *Esacus recurvirostris, Esacus magnirostris*)

First reported by Griggs (1996), who observed a single bird near Santa Cruz on 18th December 1996. **Status**: Vagrant in the inland estuary of the Mandovi river. **Habitat**: Fallow paddy-fields flooded by saline tidal waters and dry prawn ponds. **Other sites and sightings**: Two birds were seen at Divar-Piedade on 8th October 1998 and a single bird at Chorao-Madel on 17th January 2001 by Frost, Manville and the author.

RECURVIROSTRINAE
Oystercatchers, Avocets and Stilts

(360-1) **Eurasian Oystercatcher *Haematopus ostralegus*** Linn.

(Pied Oystercatcher, Common Oystercatcher, Oystercatcher)

First recorded on 20th December 1980 when 10 individuals were seen on Velsao beach. **Status**: Uncommon, but almost regular winter visitor. **Habitat**: Coastal beaches and estuarine mudflats. **Sites**: Ashvem and Morjim beach*** (Pernem); Chapora estuary** and off the Anjuna coast (Bardez); Velsao beach* (Marmagoa). **Population**: Usually encountered in small groups of single-digit strength. The largest flock consisted of 19 birds. **Seasonal status**: Recorded throughout the year. The first winter visitors start to arrive during the first week of September (earliest offshore record: 4th August) with the bulk that probably includes some passage migrants following in October. Return migration takes place during March (latest: 28th). Occasionally single birds linger on through the hot and the rainy season.

(430-1) **Black-winged Stilt *Himantopus himantopus*** (Linn.)

First recorded at in paddy-fields at Kalay on 15th December 1983. **Status**: A fairly common and widespread dry season visitor to the coastal belt and, in one instance, to the base of the Western Ghats. **Habitat**: Freshwater, brackish and saline marshes, pools, fish and prawn ponds; saltpans; irrigated paddy-fields during the winter *vaingonn* season. **Population**: This gregarious wader is mostly encountered in single-digit and low double-digit figures. Exceptionally large flocks of 50+ and 60+ birds were observed at Carambolim in January 1999 (Wadsworth 1999) and on 11th January 1996 respectively (Holt 1996a). **Seasonal status**: Recorded in all months except July and August. Influx usually begins around 10th October (earliest record: 23rd

September). Peak numbers are reached in December. Return movement stretches through March-April into the third week of May (latest sighting: 12th June).

CHARADRIINAE
Plovers and Lapwings

(373) **Pacific Golden Plover *Pluvialis fulva*** (Gmelin)

[Asian Golden Plover, Eastern Golden Plover, Lesser Golden Plover, *Pluvialis dominica* (P. L. S. Müller)]

First recorded at the Parxem-Agarwaddo marshes on 12th December 1982. **Status**: A fairly common winter visitor to the coastal plain and, in several instances, to a reservoir on top of a plateau very close to the coast. **Habitat**: Estuarine mudflats; riverine beaches; muddy banks of tidal creeks; saline, brackish and freshwater marshes and pools; pebble-strewn freshwater reservoirs; irrigated paddy-fields; abandoned stubble fields, flooded pastures and occasionally rocky seashore. **Population**: This gregarious plover occurs usually in flocks of up to a dozen and often more individuals. A saline marsh and the paddy-fields at Shiroda appear to attract the highest numbers (202, 250+ and 400+ birds in December and January) with the saline wetlands at Divar-Navelim a close second (200+ birds in September). **Seasonal status**: Recorded in all months. The vanguard, occasionally with a couple of birds in full breeding plumage, arrives in the first week of September (earliest record: 9th August) followed throughout the month by large numbers of passage migrants. The peak of the wintering population is reached in December-January. During the second half of March the population decreases rapidly and the last birds, among them the odd specimen in breeding plumage, have disappeared by mid-April (latest record: 29th). It is rare that a few birds (in non-breeding plumage) stay on during the south-west monsoon.

(371) **Grey Plover *Pluvialis squatarola*** (Linn.)

(Black-bellied Plover)

First recorded at Morjim beach, where *ca.* 50 birds were seen on 12th September 1982. **Status**: An uncommon autumn and spring passage migrant and winter visitor to the coastal belt. **Habitat**: Restricted to a saline environment like beaches, estuarine mudflats, creeks, saltpans, saline and brackish pools and marshes. **Sites**: Morjim beach, mouth of Terakol river, Ashvem beach, Parxem-Agarwaddo marshes (Pernem); Chapora estuary, Siolim Nerul creek and saltpans (Bardez); Panaji saltpans, , Santa Cruz creek, Chorao-Madel, mudflats between Divar and Chorao, Divar-Navelim, Agassaim mudflats (Tiswadi); Madkai-Cumbarjua canal (Ponda); Velsao beach (Marmagoa). **Population**: Singles and groups of up to a dozen individuals are most frequently observed. Flocks of 40, 50 and 76 birds have been recorded during au-

tumn passage in September, October and early November. **Seasonal status**: Recorded in all months. The vanguard of the autumn passage migrants starts to arrive in August, while the bulk arrives from mid-September onwards. The wintering population reaches a peak in January followed by a low in February-March and a hardly noticeable spring passage in April. Occasionally, up to 16 birds in non-breeding plumage stay on through the southwest monsoon.

(378) **Common Ringed Plover** ***Charadrius hiaticula*** Linn.

(Ringed Plover, Greater Ringed Plover)

First recorded by the author (1999a) at the ZAC freshwater reservoir on the Sancoale plateau, where a single bird was observed on 16th November 1987. **Status**: A scarce winter visitor to the coastal belt. Ali and Ripley (1983) list only half a dozen records from the entire Indian subcontinent, Grimmett *et al.* (1998) describe the species as rare in India as a whole. **Habitat**: Primarily freshwater environments like marshes, flooded paddies, the edges of pools, fish and prawn ponds, rarely at saline or brackish pools and saltpans. **Sites**: Morjim beach (Pernem); Arpora fish ponds, Baga saltpans and paddies, Candolim (Bardez); Chorao-Madel, Carambolim paddies, Panaji saltpans, Santa Cruz (Tiswadi). **Observers**: Burfield (1998), Dennis (1999), Duffield (2000), Hill (1997), Holt (1996b, 1997, 1998b), Jännes (1998), Ransdale (1998), Vermeulen (2000), Wadsworth (1999), Willoughby (1997), Wilson (1997) and the author. **Seasonal status**: Recorded in February (8 birds in 5 sightings), November (15 birds in 8 sightings) and December (16 birds in 14 sightings). The earliest record was on 2nd November, the latest on 15th February. **Remarks**: Observers who are familiar with this species and the Little Ringed Plover from Europe should be cautioned that the leg colour and absence of an eye-ring is not sufficient to distinguish the two species from one another since the birds encountered in India are in winter plumage and belong to subspecies western birdwatchers are not familiar with. Identification should be done by checking for wingbars and relying on the distinctive call.

(379-80) **Little Ringed Plover** ***Charadrius dubious*** Scopoli

First recorded on the Anjuna football ground where 15 birds were seen on 10th February 1981. **Status**: A very common winter visitor to the coastal belt and river basins, scarce further inland but with reports extending to the base of the Western Ghats. **Habitat**: Favoured are a variety of primarily freshwater wetlands that include marshes, flooded paddies, the edges of pools, tanks, fish and prawn ponds. During spring and autumn passage, birds are occasionally encountered at coastal beaches, saltpans and estuarine mudflats. **Unusual sites and sightings**: There are seven records of up to 30 birds of this species from a saline environment (Morjim beach, Chapora estuary and Baga saltpans) and four records of up to 50 birds from the base of the Western Ghats (paddy-fields at Kalay, Collem and Corgal). **Population**: Typical

day counts involve up to 30 birds and even the smallest expanse of recently plowed irrigated paddy-fields can harbour this many individuals. Congregations of up to 200 birds have been recorded. **Seasonal status**: Not yet recorded in June and July. Usually the vanguard arrives by mid-September (earliest record: 13th August), followed by a distinct autumn passage in October and, particularly, November. The moderate wintering population of January-February decreases throughout February and March, until a not very pronounced spring passage in April brings a short revival. The last stragglers leave during the first half of May (latest record: 19th).

(381-2) **Kentish Plover** ***Charadrius alexandrinus*** Linn.

(Snowy Plover)

First reported by Saha and Dasgupta (1992), who collected two female birds at Colva beach on 19th December 1968 during one of their many collecting trips to Goa for the Zoological Survey of India. They ascribed the specimens to the nominate race *C. a. alexandrinus*. **Status**: Widely divergent if not contradictory views are held by the visiting birders on one side and the resident birdwatchers, i.e. Frost and the author on the other. While the first rate this plover 'a very common winter visitor' (Holt *in litt.* 2000), the latter stick to their earlier assessment that it is an uncommon, if not irregular winter visitor (Lainer 1999a). Holt (*in litt.* 2000) sums it up: "It's difficult to reconcile Lainer's comment that 'numbers vary capriciously from a single or a dozen in one year to several hundreds in the next' (Lainer 1999a) with the pattern perceived by most visiting observers. The species is clearly neither uncommon, nor irregular with parties of up to 80 birds being not infrequent and single flocks exceeding 200 not unknown." It is obvious that one of the two sides has to be in error, probably due to a serious misidentification. **Habitat**: Coastal and riverine beaches, tidal mudflats. Holt (*in litt.* 2000) adds to this 'pool margins, saltpans and fish and shrimp ponds up to 10 kilometres from the coast. The species only occasionally visits freshwater venues such as irrigated paddy-fields.' **Sites**: The riverine Miramar beach at the mouth of the Mandovi appears to be the only site where this plover is found more or less regularly. Other sites include Morjim and Velsao beach, Chapora estuary and mudflats at the Cumbarjua canal. Visiting birdwatchers have the following sites to add: Terakol estuary, Sinquerim, Pomburpa, Chorao, Ciba-Geigy, Santa Cruz, Carambolim grasslands and Agassaim mudflats. **Observers**: Anon (1998a), Beevers (1999), Burfield (1998), Dennis (1999), Gregory (1999), Griggs (1996), Hill (1995, 1997), Holt (1996b, 1997, 1998a, 1998b, 1999), Lassey (1999), Marsh (1996), Ransdale (1998), Willoughby (1993, 1997). **Population**: Usually encountered in groups of up to a dozen individuals. Flocks of several hundreds of birds were observed only in February and March 1986, at Morjim beach. Visiting observers have claimed dozens of sightings of between 50 and 250 birds and one of *ca.* 500 at Miramar beach, on 21st October 1999 (Gregory 1999). **Seasonal status**: The earliest seasonal sighting (by the 'locals') was on 20th November and the latest on 17th April.

(384-4a) **Lesser Sand Plover** *Charadrius mongolus* Pallas

(Mongolian Plover)

First recorded at Morjim beach on 2nd November 1983. **Status**: A very common winter and dry season visitor to the coastal belt and river basins. Small numbers regularly stay over the southwest monsoon. **Habitat**: Found in an almost exclusively saline environment like coastal and riverine beaches, estuarine mudflats, fish and prawn ponds, brackish marshes, saltpans and, rarely, the edges of freshwater pools and reservoirs. **Favoured sites**: Chapora estuary with over 1500 and over 2000 individuals on two occasions each; Agarwaddo marshes (up to 500), Panaji saltpans (up to 224) and Divar-Chorao mudflats (up to 300+). **Population**: This very gregarious plover is rarely seen singly or in twos. The commonest flock configurations are 100 birds (16 sightings), 200 (13), 20 (11), 50 (10) and 150 (8). There appears to be a general decline in the number of wintering birds. Since January 1990, not a single instance of a flock of over 1000 birds has come to the author's notice. **Seasonal status**: There is little discernible pattern except that numbers peak in January and for a hint of an autumn passage migration in September. Over-summering by a handful of birds is fairly frequent if not regular. **Plumages**: Partial breeding plumage is first noticed towards the end of April while in May an increasing number of birds is seen in full breeding plumage. All over-summering birds in June/July are in non-breeding plumage. Few of the first returning winter visitors in August wear full, the majority partial breeding plumage, which is gradually lost till mid-September. **Remarks**: The ratio of Lesser Sand Plover / Greater Sand Plover varies widely and erratically from site to site and from month to month. There is no underlying pattern discernible. The extremes are ratios like 224:3 on the one side and 5:50 on the other. The average ratio (throughout the year, from 1988 to 2001) works out to 2,68:1.

(374) **Greater Sand Plover** *Charadrius leschenaultii* Lesson

(Large Sand Plover)

First recorded at Morjim beach on 12th September 1982. **Status**: A common winter and dry season visitor to the coastal belt and river basins. **Habitat**: Identical to the Lesser Sand Plover's. **Favoured sites**: Parxem-Agarwaddo (Pernem); Chapora estuary** (Bardez); Divar-Navelim***, Divar-Chorao mudflats, Panaji saltpans, Santa Cruz creek, Agassaim mudflats (Tiswadi); Velsao beach* (Marmagoa). **Population**: Less numerous and somewhat less gregarious than Lesser Sand Plover, this species occurs most frequently in singles and groups of up to 10 individuals. Flocks of up to 50 birds are not unusual, while the largest ever observed consisted of 200, 300 and 400. **Seasonal status**: Recorded throughout the year. Peak numbers are reached in January. There is a marked autumn passage in September and a less pronounced spring passage in May. Over-summering by a handful of birds is irregular. **Plumages**: Full breeding plumage may be seen as early as at the end of April and is commonest throughout May with many birds still being parti-coloured. The few

over-summering birds wear an eclipse plumage that is identical to the winter plumage. Some of the incoming birds in August are either in full or partial breeding plumage while many of the passage migrants in September are moulting into winter plumage, the majority being juvenile birds in winter plumage-like eclipse.

(376) **Caspian Plover *Charadrius asiaticus*** Pallas

(Caspian Sand Plover)

Status: Vagrant. A female bird, on the verge of changing into winter plumage was observed by Frost and the author (*J. Bombay nat. Hist. Soc.*, in prep.) on 10th and 15th October 2001 on grassland in the vicinity of tidal mudflats on Divar Island, in the inland estuary of the Mandovi. **Remarks**: This is only the second record from the Indian mainland, the first being from near Ratnagiri (Maharashtra), also on the west coast, in *ca.* 1880 (Ali & Ripley 1983).

(370) **Yellow-wattled Lapwing *Vanellus malabaricus*** (Boddaert)

(Yellow-wattled Plover, *Hoplopterus malabaricus*)

First reported by Grubh and Ali (1976), who noted it at Mollem and Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: This subcontinent endemic is an uncommon, breeding resident of the coastal belt; it is scarcer in the midland region and at the base of the Western Ghats. **Habitat**: Treeless rocky lateritic plateaus; arid wastelands, pastures, fallow cultivation, stubble fields and, during the winter *vaingonn* season, irrigated and freshly plowed paddy-fields. **Favoured sites**: Dargal * (Pernem), Anjuna, Siolim-Marna paddies (Bardez), Divar-Navelim grasslands***, Dona Paula plateau (Tiswadi), Sancoale plateau** (Marmagoa). **Unusual sites**: Brimbol mine near Mollem, near Backwoods Camp (Sanguem), Cotigao WS (Canacona). **Population**: Gregarious as all plovers, this species is encountered in flocks of up to a dozen birds though congregations of up to 25 individuals have been noted. **Breeding status**: Incubation was noted in the first half of May and during the first week of June on pasture land at Divar-Navelim. **Seasonal status**: Recorded throughout the year but largely nomadic during the southwest monsoon. The large numbers recorded from November through January reflect the attraction freshly plowed irrigated paddy-fields exert on the birds.

(365) **Grey-headed Lapwing *Vanellus cinereus*** (Blyth)

(*Hoplopterus cinereus*)

First reported by G. Featherstone, who observed two birds in the Baga marsh on 31st December 1988 and 1st January 1989. He informed the author who managed to see one of these birds, a sub-adult, on 2nd January (Lainer 1991). **Status**: A very rare winter visitor to the coastal belt and the base of the Western Ghats. This species is a

regular winter visitor to north-eastern India that rarely strays into other parts of the subcontinent. There are only two other reports from South India: near Bangalore (Karnataka) and Chennai (Madras) in Tamil Nadu (Grimmett *et al. 1998*, Kazmierczak 2000). **Other sightings**: 'A pair seen in paddy-fields north side of road inland of Usgao Tisk in December 1998' (Wadsworth 1999). One bird was reported at the Santa Cruz creek from 2nd – 12th February 2000 by several observers (Bradshaw, Naylor, Duffield *et al.* pers. comm. 2000). An immature bird was present at the Santa Cruz creek at least from 24th November to 3rd December 2000 (Frost, author).

(366-8) **Red-wattled Lapwing *Vanellus indicus*** (Boddaert)

(Red-wattled Plover, *Hoplopterus indicus*)

First reported by Saha and Dasgupta (1992), who collected one bird at Margao on 17th December 1968. They ascribed this and several subsequently collected specimens to the nominate race *V. i. indicus*. **Status**: A very common, conspicuous and widespread breeding resident from the coast to the base of the Western Ghats; also found on the crest of the Ghats. **Habitat**: This bird is catholic in its choice of habitat, as long as it is open and in the vicinity of water. It can be seen almost anywhere from the seashore to pools in fairly dense jungle on the lower slopes of the Ghats. **Population**: There is little information on flock sizes since birds congregate at best only in very loose groups. Over a hundred birds were present in the Santa Cruz paddy-fields on 21st November 2000 and over 50 in the Mollem paddies on 23rd December 1995. **Seasonal status**: Recorded throughout the year in nearly unvarying numbers; no seasonal movement is discernible. **Breeding status**: The breeding season appears to be protracted but centered loosely around the southwest monsoon. Incubation was noted between 6th April and 6th July, downy chicks were observed between 18th April and 22nd June. **Miscellaneous**: The species *Vanellus indicus* was originally described by Boddaert in 1783 as *Tringa indica* from a lithograph by Daubenton, with Goa as the type locality.

(362) **White-tailed Lapwing *Vanellus leucurus*** (Lichtenstein)

(White-tailed Plover, *Chettusia leucura*)

First reported by Holt (1996b), who observed one bird in the flooded paddy-fields of Carambolim on 19th December 1996. **Status**: Stray or very rare winter visitor in the coastal belt. **Other sightings**: One bird was observed in the recently inundated paddy-fields at Baga on 13th November 1999 (Follows, Doherty *et al.*, *fide* Holt 1999). Another single was seen at Merces on 14th February 2000 (Duffield 2000); the specimen remained until at least 19th February 2000.

GLAREOLIDAE

DROMADINAE

(434) **Crab Plover** ***Dromas ardeola*** Paykull

First reported by Claydon (1993), who observed three birds on sandbanks in the mouth of the Chapora river on 19th November 1993. **Status**: A rare dry season visitor to the sea coast and estuaries. **Other sightings**: Single birds were recorded on tidal mudflats in the estuary of the Chapora river on 4th October 1996, travelling *ca. 300* metres off the Anjuna coast in a southerly direction on 18th October 1998, at Morjim on 24th December 2000 (Wadsworth 2000) and in the Chapora estuary on 22nd September 2001 (Frost, pers. comm.).

GLAREOLINAE

Pratincoles and Coursers

(442) **Collared Pratincole** ***Glareola pratincola*** (Linn.)

First reported by Tunturi (1998), who observed one bird on the Carambolim grasslands on 22nd November 1998. **Status**: A vagrant or very rare visitor to the coastal belt. **Habitat**: As in Oriental Pratincole. **Other sightings**: Two birds were seen passing over the saline wetland and pastures of Divar-Navelim on 9th September 1999 (Frost and the author).

(443) **Oriental Pratincole** ***Glareola maldivarum*** J. R. Forster

(*Glareola pratincola*, Collared Pratincole)

First recorded on 22nd February 1986, when a single bird was observed in the Parxem-Agarwaddo marshes. **Status**: An occasional dry season visitor in the coastal belt and river basins. **Habitat**: Coastal beaches and tidal mudflats in estuaries, grasslands and pastures, freshly plowed irrigated paddy- fields and stony barren margins of freshwater tanks. **Sites and sightings**: Three sightings of up to 15 individuals are from Divar-Navelim and three sightings each of single birds from Morjim beach, the Chapora estuary and ZAC reservoir. **Observers**: Frost (pers. comm.), Luoto (*in litt., fide* Holt 2000) and the author. **Seasonal status**: Oriental Pratincoles were recorded in May, July, September, October and December. **Plumage**: The 14 adult birds seen on 27th September 1998 were in non-breeding, a bird seen on 16th May 1999 in full breeding plumage. Single juvenile birds were observed on 27th September and 3rd July.

(444) **Small Pratincole** *Glareola lactea* Temminck
(Little Pratincole)

First recorded on 3rd March 1982, when *ca.* 150 birds were observed at Morjim beach on March 3, 1982. **Status**: A fairly common, but capricious and locally nomadic winter visitor in the coastal belt. **Habitat**: Saline, brackish and freshwater wetlands, coastal beaches, estuarine sandbanks, trash fish drying yards behind beaches, freshly plowed or transplanted inundated paddy-fields, pool edges. Groups of nomadic birds commuting between wetlands or paddy-fields may be encountered almost anywhere in the coastal belt and even over forest (e.g. in the Cotigao WS). **Favoured sites and maximum numbers**: Morjim beach (2000+), Paliyem paddies (150+), Parxem-Agarwaddo paddies (2000+) [Pernem]; Baga paddies (250+), Arpora paddies (200), Candolim marsh (208), Siolim (100) [Bardez]; Carambolim paddies (2000+), Santa Cruz (1500+), Neura wetlands (603), Corlim paddies (500) [Tiswadi]; Shiroda marsh and paddies (480+) [Ponda]; Velsao paddies (250+) [Marmagoa]; Velim paddies (600) [Salcete]; Chauri paddies (300+) [Canacona]. **Population**: This very gregarious species is rarely encountered singly or in groups of single-digit strength. There are ten sightings of about 100 birds, eight of 300, four of 500, eight of 1000 and seven of 2000. Peak numbers were reached in the mid-eighties, followed by a long decline. Only in the years 1999 and 2000 was this trend reversed. Because of the species' mobile and nomadic nature, with flocks often favouring specific sites for only short periods before moving on, counts vary erratically from day to day. **Seasonal status**: There is a very sudden influx at the beginning of November, probably prompted by the start of plowing operations for the winter paddy crop. This is in some years preceded by a few birds in the second half of October (earliest record: 23rd September). Highest numbers are reached in January. The main body of the wintering population leaves during February, coinciding with the gradual drying of the paddy-fields whose standing crop, moreover, has reached a height that is unsuited for Small Pratincoles (latest record: 19th April).

LARIDAE
Skuas, Jaegers, Skimmers, Gulls and Terns

(484) **Indian Skimmer** *Rynchops albicollis* Swainson

First recorded by the author (1999a) and Frost on 5th September 1996 when a single adult bird was spotted among terns on tidal mudflats in the estuary of the Chapora river. **Status**: Vagrant from North India. **Other sightings**: One bird was seen flying northward *ca.* 200 metres off the coast of Anjuna on 28th September 1998. **Remarks**: These two records, along with a sighting at Gokarn (about 70 kilometres south of Goa) in September 1988 (Madsen, author), apparently are the southernmost in the Indian subcontinent. Even more remarkable is that the Indian

Skimmer, a bird of large rivers, should appear on the seacoast in an area that is cut off from any of the larger river systems by the barrier of the Western Ghats.

Large white-headed Gulls

The taxonomic status of large white-headed gulls is in constant flux. At present the 'splitters' appear to have the upper hand and introduced in 1998 two new species, Heuglin's Gull *Larus heuglini* and Yellow-legged Gull *Larus cachinnans* with their assorted subspecies. Since most of the records of this group of birds fall into the period before 1998, I will use in this compilation the old – and still widely accepted – classification which 'lumped' the two forms as Herring Gull *Larus argentatus.*

(450-1) **Herring Gull *Larus argentatus*** (Pontoppidan)

First recorded on 5th April 1982 at Morjim beach. **Status**: A common winter visitor and passage migrant all along Goa's coastline. **Habitat**: Open sea up to *ca.* 5 kilometres offshore and estuaries. This species has only once been recorded more than one kilometre inland, i.e. an immature bird at Divar, an island in the inland estuary of the Mandovi, *ca.* 14 kilometres from the river mouth. **Favourite sites**: The lone roosting site is the estuary of the Chapora river and adjacent Morjim beach, from where the birds disperse daily to forage. **Population**: The wintering population was more or less static at numbers below 100 individuals throughout the eighties and up to the mid-nineties. After an extraordinary and sudden peak of 800+ birds in the winter 1997/98 the population went into a gradual decline but still high until it made an exponential jump to 3606+ birds in 2001/02. **Seasonal status**: Along with the increase in numbers from 1997 onwards came an advance in the date of the winter visitor's arrival from around mid-September to the last ten days of August (earliest record: 19th). There is a marked southward offshore migration of up to *ca.* 100 individuals per hour throughout September and the first week of October. The northward return migration throughout April is less pronounced. The latest birds were seen on 17th May.

(453) **Pallas's Gull *Larus ichthyaetus*** Pallas

(Great Black-headed Gull)

First recorded at the Terakol estuary where six birds were seen on 24th January 1982. **Status**: A fairly common winter visitor to Goa's coastline. **Habitat**: Open sea, beaches and estuaries. This species, like the previous one, was not found more than one kilometre inland, except twice when single birds strayed up the Mandovi to Divar and Chorao, about 14 kilometres from the sea. **Favourite roost sites**: Terakol estuary*, Mandrem and Morjim beach***, Chapora estuary**. **Population**: The number of winter visitor varies erratically from year to year, as the following table shows: Annual maximum numbers at Morjim beach (all available material)

'82	'83	'84	'85	'86	'87	'88	'89	'90	'93	'95	'96	'97	'98	'99	'00	'01
150	50	25	5	150	15	12	50	100	10	100	50	80	39	65	245	54

The highest number, 245 individuals, was counted by Duffield (2000) on 16th February 2000. **Seasonal status**: The winter visitors usually arrive in September (earliest record: 18th August) while return migration lasts throughout April (latest record: 24th).

(454) **Brown-headed Gull *Larus brunnicephalus*** Jerdon

(Indian Black-headed Gull)

First recorded on Velsao beach where over 5000 birds were seen on 20th December 1980. **Status**: A very common, in some years abundant winter visitor along Goa's entire coastline. **Habitat**: Open sea (up to about 5 kilometres offshore), beaches, estuaries (up to about 15 kilometres inland); fishing harbours and occasionally freshly plowed irrigated paddy-fields. **Favourite roost sites**: Terakol estuary; Arambol, Mandrem and Morjim beach (Pernem); Santa Cruz creek; Chorao, Divar and Agassaim mudflats (Tiswadi); Velsao beach (Marmagoa) and Sal estuary at Betul (Salcete). **Population**: The size of the largest gatherings (mostly in the Chapora estuary and on Morjim and Velsao beach) varies from 2500 to 5000 individuals annually. Only in the years 1981, 1997, 1998 and 1999 did the wintering population drop noticeably, with flocks reaching not even the 500 mark. The largest flock, an estimated 7000 birds, was observed in the Chapora estuary on 13th January 2000. **Seasonal status**: The winter visitors variously make their appearance between mid-September and mid-October (earliest record: 7th September); by the end of April the majority have left (latest record: 29th May).

(455) **Black-headed Gull *Larus ridibundus*** Linn.

First recorded at Terakol on 30th January 1982. **Status**: A common, in some years abundant winter visitor along the entire coastline. **Habitat**: As the previous species, Brown-headed Gull. **Favourite roost sites**: As Brown-headed Gull. **Population**: Numbers fluctuate massively from year to year. Highest numbers are usually recorded from December through February. Annual maximum numbers (all available material):

1983	10000	1987	1500	1990	4000	1998	40
1984	9000	1988	4000	1996	150	1999	177
1985	1000	1989	150	1997	500	2000	2300

Generally much less numerous than Brown-headed Gull though immense single-species gatherings used to occur in the early eighties (e.g. 10,000+ at the Chapora estuary on 24th February 1983 and 9000+ birds on 30th December 1983). Flocks of several hundred to a few thousand birds in which Brown-headed Gulls were outnumbered by a ratio of up to 5:1 were observed in 1982 and 1984. The other ex-

treme was a single Black-headed Gull among 5000+ Brown-headed on 28th December 1988. **Seasonal status**: Influx of the winter visitors starts mostly in the first half of October (earliest record: 18th September). Mid-May usually sees the last birds leaving, though up to four birds have been found staying on right into the southwest monsoon (latest record: 29th July).

(456) **Slender-billed Gull *Larus genei*** Brème

First recorded at the Parxem-Agarwaddo marshes where a single bird was seen in March 1983. **Status**: Ali and Ripley (1983) rated this species a casual winter visitor to the West coast down to Bombay. In the eighties the Slender-billed Gull was a rare winter visitor to Goa. Since the beginning of the nineties it has emerged an uncommon to occasionally fairly common and regular winter and/or dry season visitor to the coast of North Goa. **Habitat**: As for Brown-headed Gull. **Sites**: Terakol estuary, Parxem-Agarwaddo marshes (Pernem); Chapora estuary***, off Fort Aguada (Bardez); Santa Cruz creek, Agassaim mudflats (Tiswadi). Not yet recorded south of the Zuari river. **Population**: The largest recorded number of 200+ was counted and 350+ birds were estimated to be present in a densely packed flock of Brown- and Black-headed Gulls on tidal mudflats in the Chapora estuary on 13th January 2000. Groups of 29 (Lassey 2000), 30+ (Duffield 2000), 20 (Wadsworth 2000) and 50+ (Todd 2000) were observed at Chapora and the Santa Cruz creek between late December 1999 and the end of January 2000. **Seasonal status**: The earliest sighting was of a single bird in breeding plumage on 21st August 1996, the latest of two grubby and sick looking individuals on 3rd May 2001.

(460-1) **Gull-billed Tern *Gelochelidon nilotica*** (Gmelin)

(*Sterna nilotica*)

First reported by Grubh and Ali (1976), who noted it in 'north Goa' during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: Widespread and common winter and dry season visitor; common offshore passage migrant in spring and autumn. **Habitat**: Inshore waters; beaches; estuaries; tidal rivers; fish and shrimp ponds; saltpans; saline, brackish and freshwater marshes; freshwater ponds, tanks and reservoirs. **Favourite roost sites and population**: Chapora estuary (200+ birds on 26th November 2000); Santa Cruz creek (415 on 24th November 2000); Divar-Navelim (113 on 17th September 1999); Agassaim mudflats (117 on 19th January 2001). **Seasonal status**: Though considered a winter and dry season visitor this species was recorded throughout the year. A handful of individuals regularly stays on through the southwest monsoon. **Migrations and diurnal movements**: A marked annual offshore northward migration of up to 165 individuals in 2 hours was observed in spring. It usually sets in around 10th April and tails off towards the end of May. The southward return migration in autumn begins in mid-August and ends during the second half of October. These seasonal movements are

difficult to distinguish from the daily dispersal movement from the large roosting sites, which takes place between sunrise and *ca.* 9 am. **Remarks**: Birds in breeding plumage were observed in March, April, May and August. Even in May, when they are on their way to the breeding grounds, just about 12% are in breeding plumage.

(462) **Caspian Tern *Sterna caspia*** (Pallas)

(*Hydroprogne caspia*)

First recorded on 3rd April 1981, when four birds were sighted off the Terakol coast. **Status**: Uncommon winter visitor to the coast mainly of North Goa. Fairly common spring and autumn passage migrant. **Habitat**: Offshore waters (up to about one kilometre from the coast) and tidal estuaries. Rarely found a few hundred metres inland, apparently when commuting between estuaries and up to 12 kilometres inland along the larger tidal rivers. **Distribution**: Only once recorded in South Goa, at Galgibag beach in Canacona (Tarrant 1997). **Favourite roost sites**: Chapora ***and Terakol* estuary. **Population**: Single birds and groups of up to five birds are the norm though larger groups of up to 27 individuals were encountered. Groups of this tern have a tendency to stay on at an estuary for a week or ten days at a time. **Seasonal status**: Absent in January-February and May to July. Spring passage takes place in March-April (earliest record: 3rd March, latest: 20th April). Autumn passage commences in late August (earliest record: 17th), peaks in October and ends in November or early December (latest record: 14th). **Migration**: Offshore migration in a northerly direction was noted in March (two sightings), in a southerly direction in August (2), September (4) and October (3). **Plumage**: Birds in breeding plumage were noted in March, August and October.

(463) **River Tern *Sterna aurantia*** J. E. Gray

(Indian River Tern)

First recorded on 18th September 1988, when a single bird was seen in the estuary of the Chapora river. **Status**: A scarce and erratic though apparently annual visitor to the coastal belt and, where rivers cut through it, the midland region. **Habitat**: Though this species is, in its breeding area, restricted to freshwater bodies, it frequents in Goa fully saline tidal rivers, estuaries and saline lagoons and wetlands beside freshwater tanks and ponds. **Sites and sightings**: Ciba-Geigy (nine sightings), Carambolim lake (7), Chapora river (3), Chapora estuary, Mandovi river , Zuari river and Divar-Navelim (two each), Chorao and Velim tank (one each). **Population**: 19 sightings were of single birds, six of two birds, three of three and one of four birds. **Seasonal status**: Recorded in all months except June and August. **Plumage**: Non-breeding plumage was noted on one bird in mid-September. **Remarks**: There is one instance of two birds in breeding plumage travelling several hundred metres offshore in a northerly direction. Weather conditions at the time (22nd May 2001) were cyclonic.

(479) **Lesser Crested Tern *Sterna bengalensis*** Lesson

(Indian Lesser Crested Tern)

First recorded on 25th March 1982, when over 20 birds were seen at the Chapora estuary. **Status**: A common visitor to coastal sites throughout the year. **Habitat**: Offshore waters up to 4-5 kilometres from the coast, tidal estuaries, mouths of large rivers and occasionally mudflats of inland estuaries. **Roost sites and population**: Chapora estuary (maximum numbers 800+); Agassaim mudflats (15+); Marmagoa harbour (~15); Terakol estuary (4) and Divar-Chorao mudflats (1). **Population**: An average monthly maximum of 77 Lesser Crested Terns were counted at the Chapora estuary during the years 1982-89 and 1996-2001. The highest number were at least 800 birds on 28th March 1984 and over 500 on 28th February 1985. Flocks of up to 150 are not rare. **Seasonal status**: Average monthly maximum numbers of terns show a rise from 119 birds in January to a peak of 226 in March, followed by a rapid decline to 27 in June and 8 in July. August and September are marked by a gradual increase to an autumnal maximum of 103 birds in October while numbers fall off again to 21 in November and 48 in December. **Migration and diurnal movements**: From their roost in the Chapora estuary Lesser Crested Terns disperse daily from sunrise onwards over the inshore waters (up to about 4-5 kilometres from the coast) to forage, usually returning around noon to rest on the mudflats. This movement is repeated in the late afternoon. This constant diurnal shifting makes it very difficult to discern genuine migratory movements. Only on 8th June 1998 was an unequivocal southward migration observed, of up to 10+ birds per minute, with high migratory urge, towards the approaching southwest monsoon and, possibly, their breeding sites on the Maldives. A further offshore migration was noticeable between 30th September and 18th October 1998. It was of lesser intensity but involved a larger number of birds due to its longer duration. Curiously, this migration led southward too, opening the possibility that the migrants were coming from breeding sites in the Indus delta.

(478) **Great Crested Tern *Sterna bergii*** Lichtenstein

(Greater Crested Tern, Swift Tern, Crested Tern)

First recorded on 13th April 1982 at the Chapora estuary. **Status**: A seasonally common, year-round visitor to the coast of North Goa. **Habitat**: Coastal waters, offshore islands and river estuaries up to *ca*. 14 kilometres inland. **Sites**: Off Terakol, Mandrem, Morjim (Pernem); Chapora, Anjuna, Baga, Fort Aguada (Bardez). The largest traditional roosting place is on Morjim beach and in the adjacent Chapora estuary, a minor one on mudflats and fishing stakes at Agassaim. This tern has not yet been recorded from South Goa though it certainly occurs there at least during migration. **Population**: The average number of birds counted at the Chapora estuary during the years 1982-89 and 1996-2001 was 41, the highest 380+ on 27th May 2001 (Frost pers. comm.) and 306+ on 12th September 1998. Flocks of 100-200 specimens are

fairly common. **Plumages**: This tern moults into breeding plumage in April. Full breeding plumage is worn from May through August, fading breeding plumage in September. **Seasonal status**: The population is lowest in January (average: 8) and increases steadily to a pre-breeding peak in May (average: 89). Average numbers during the monsoon months June and July drop to 34 and 21 respectively, mainly of non-breeding adults, and rise to 75 and 73 in the post-breeding months August and September, almost exclusively of first and second year juveniles. The average population during October-December is between 14 and 18 birds. **Migration**: The year-round presence of birds foraging in coastal waters makes it difficult to pin down a migratory movement but between early February and late May a somewhat diffuse northward offshore passage can be distinguished. There is a post-breeding dispersal involving a vague southward movement in autumn. **Breeding status**: Up to 2000 Great Crested Terns breed annually on the Vengurla Rocks, a group of islets off the Maharashtra coast between Vengurla and Malwan (Sindhudurg distr.), about 32 kilometres north of Goa.

(480) **Sandwich Tern** ***Sterna sandvicensis*** Latham

First recorded on 11th July 1981 at Velsao beach. **Status**: Ripley (1982) rated the Sandwich Tern a 'winter visitor to the coast of Pakistan and Gujarat.' The author (1990) pointed out that this species 'can be categorized as a regular winter visitor [to Goa] in substantial numbers, with a sizeable summering population of non-breeding birds'. Writing almost a decade later, the author (1999a) rated this tern a 'common, considerably numerous year-round visitor to the entire coastline [of Goa]...Their numbers ... are declining steadily over the years.' At present, the Sandwich Tern can be termed only an uncommon visitor at all seasons to the coast of North Goa. **Habitat**: Offshore waters up to a distance of *ca.* two kilometres and tidal estuaries. **Sites**: Estuaries of the Terakol, Chapora, Mandovi (up to 10 kilometres inland) and Zuari rivers. **Population**: The average monthly maximum number of birds counted at the Chapora estuary was in

1982	123	1983	67	1984	138	1985	114	1986	222	1987	100	1988	97
1989	35	1996	23	1997	13	1998	42	1999	13	2000	11	2001	21

Large flocks of over a hundred birds were common in the eighties e.g. 500+ birds on 28th March 1984 and 2nd February 1986, 450+ on 20th March 1986 and 400+ in April 1982, May 1985 and March 1986. Since 1989 congregations were below 50 individuals, except in August 1998 when *ca.* 125 were estimated to be present. **Plumage**: All birds observed were in non-breeding plumage. **Seasonal status**: The average monthly maximum number counted in the years 1982-89 and 1996-2001 decreases steadily from 176 in January to 124 in May and 89 in June, followed by a steep drop to 20 in August. Numbers remain relatively low in September to December with 75, 33, 35 and 67 respectively. **Migration**: In some years a northward offshore movement was observed in September though in most years it is hardly detectable.

(466) **Roseate Tern *Sterna dougallii*** Montagu

(Rosy Tern)

First recorded with certainty, when an adult bird was seen at the Chapora estuary, on 13th April 1982. **Status**: An uncommon to scarce, but regular autumn visitor to the Chapora estuary; rare spring and uncommon autumn offshore passage migrant. **Sites**: Tidal mudflats in the Chapora estuary and the adjacent Morjim beach; coastal waters off Anjuna (and presumably all along Goa's coastline). **Population**: The numbers of birds resting on the Chapora mudflats are usually in their single-digits though larger congregations have been observed, e.g. 30+ individuals on 18th August 1998 and 13th September 2001, 73+ on 5th September 2000, 120+ on 24th September 2001 (Frost pers.comm.) and 123+ on 12th September 2001. Plumage: The Roseate Terns are generally adults in various stages of fading breeding plumage; only a single juvenile has been recorded (on 23rd September 1997). **Breeding status**: Up to at least 10 000 birds, possibly over 15 000, breed annually during the southwest monsoon on Burnt Island in the Vengurla Rocks, a cluster of rocky islets *ca.* 16 kilometres off the Maharashtra coast between Vengurla and Malwan (Sindhudurg distr.), about 50 kilometres north of Chapora (Lainer 2003). **Seasonal status**: The first autumn migrants turn up at the Chapora estuary in late August (earliest record: 18th) and the last are seen in mid-September (latest record: 24th). **Migration**: Spring passage was noted only once when a single specimen was seen heading north off the Anjuna coast. The much more pronounced southward autumn passage takes place throughout September with as many as 290 birds passing *ca.* 100 metres offshore within half an hour (on 2nd September 2000). **Subspecific status**: Geographical variation involves mainly bill colour. The form *S. d. korustes* that occurs in India and Burma shows always a varying amount of black on its bill tip while only the form *ariidensis* of East Africa and Seychelles and *gracilis* of Australia and New Caledonia can have an all-red bill during breeding season (Olsen and Larssen 1995). However, all the birds occurring in Goa and the Vengurla Rocks in breeding season have fully red bills without even the slightest trace of black. They could be the representatives of an as yet undescribed subspecies (Olsen *in litt.* 2001).

(464-5) **Common Tern *Sterna hirundo*** Linn.

(Tibetan Common Tern)

First recorded with certainty on 12th August 1996 at the Chapora estuary, when an injured bird was examined and identified. **Status**: 'Uncertain, mainly due to confusion with White-cheeked Tern *S. repressa* when both are in non-breeding plumage or migrating far offshore. The Common Tern is with certainty a minor participant in the annual spring and post-monsoon mass-migration of the White-cheeked Tern. Small numbers are found off and on at estuarine mudflats and beaches during the winter months' (Lainer 1999a). **Habitat**: Coastal waters up to *ca.* two kilometers offshore, tidal mudflats in river estuaries up to 14 kilometres inland and, occasionally, adja-

cent beaches. **Sites**: Morjim beach, Chapora estuary, off Anjuna, Divar-Chorao mudflats and Miramar beach. **Population**: Usually encountered singly or in small groups of up to four birds. **Seasonal status**: Birds at rest were recorded in April (two sightings), August (3), September (6), October (2) and December (1). **Remarks**: The author found it extremely difficult, if not impossible, to tell Common Terns from White-cheeked Terns under the conditions prevailing during offshore migration time. Even birds at rest can be baffling. A fieldscope with thirty-fold magnification is not sufficient to distinguish the Common Tern with certainty from White-cheeked Terns if they are in non-breeding plumage, which they mostly are. However, a high resolution 60x magnifying fieldscope will show at short distance that most, but not all, White-cheeked Terns have a tiny ivory-coloured tip to their bill that is much smaller in extent than the Sandwich Tern's, a fact that is mentioned among all the authors only by Ali and Ripley (1983).

(475-6) **Little Tern *Sterna albifrons*** Pallas

First recorded on 20th December 1980 at Velsao beach. **Status**: An annual visitor to the coastal belt that is encountered in all seasons. **Habitat**: Coastal waters up to about 300 metres offshore; beaches and estuarine mudflats; rivers, creeks, saline, brackish and freshwater marshes and wetlands up to 16 kilometres inland. **Sites**: Terakol estuary, off Arambol, Parxem-Agarwaddo marshes, Morjim beach (Pernem); Chapora estuary, off Anjuna, Candolim marshes, Nerul creek (Bardez); Divar-Navelim, Santa Cruz creek, Agassaim mudflats (Tiswadi); Madkai mudflats (Ponda); Cortalim mudflats, Velsao beach (Marmagoa); Betul bay (Quepem). **Population**: Singles, pairs and groups of up to 10 birds are the norm and double-digit flocks of up to 50 birds are uncommon. The maximum number was 150+ birds at Morjim beach, on 25th April 1982. **Plumage**: Little Terns in breeding plumage were noted in April-May. **Seasonal status**: Recorded throughout the year. Sightings are most frequent in the pre-monsoon period of April-May and after the southwest monsoon in September. **Migration**: Northward offshore spring passage appears to be a rare and very low-key affair; it was observed only in 2001, between 18th April and 14th May. Capriciously fluctuating numbers of southward-bound birds are observed annually off the Anjuna coast.

(467) **White-cheeked Tern *Sterna repressa*** Hartert

First recorded when a single bird was seen at Morjim beach, on 6th May 1985. **Status**: An offshore passage migrant that is uncommon during spring and abundant during autumn migration. During both movements birds tend to rest in river estuaries. **Habitat**: As for Common Tern *S. hirundo*. **Sites**: Resting places are Morjim beach, Chapora estuary, Santa Cruz creek and Agassaim mudflats. Birds on mass migration were observed off the Anjuna coast. **Population**: Resting birds in spring are generally encountered singly, with one instance of three individuals. During the

spectacular autumn passage groups are more likely to be in high double-digit figures, the maximum numbers being at least 160 birds on the Agassaim mudflats on 24th September 2001 and over 300 on the Chapora mudflats on 24th August 2001. **Plumage**: All the spring passage migrants were in non-breeding plumage, except one on 19th April 1998, which was in almost full breeding outfit. During autumn passage, various percentages of birds are either first year juveniles or adults in non-breeding, partial or fading breeding and full breeding plumage. **Breeding status**: Abdulali (1939, 1941, 1983) had conclusively established the White-cheeked Tern as breeding during the southwest monsoon in the colony of terns on Burnt Island in the Vengurla Rocks, a cluster of rocky islets *ca.* 16 kilometres off the Maharashtra coast between Vengurla and Malwan (Sindhudurg distr.), about 50 kilometres north of Chapora or 32 kilometres north of the Goa border. In recent years, no signs could be found that this species continues breeding there (Lainer 2003). **Seasonal status**: This tern has not yet been recorded in the period from November through March. Spring passage was noted between 19th April and 26th June. Resting birds during autumn passage were observed between 18th August and 4th October. **Migration**: A regular 'seabird watch' was kept in the years 1996-2001. During this period, spring passage was noted only once i.e. in 2001 when at least 1140 birds traveled north between 24th March and 11th April. Southward autumn passage appears to be regular and on a much grander scale as the following table shows:

1996	at least 7317	birds between 3rd September and	7th October
1997	9670	29th August	8th October
1998	14249	11th August	22nd October
1999	5341	10th August	20th September

Peak rates of passage were 414 birds per hour on 24th September 1996 and 453 birds per hour on 6th September 1997. **Remarks**: See under the heading 'Remarks' for Common Tern. The author has a nagging suspicion that the large flocks of up to 500 smallish and whitish terns resting on the Chapora mudflats in March, April, May and June of 1982 and 83, which he could not identify at the time for lack of adequate optical equipment, were actually White-cheeked Terns on their return migration to the breeding grounds, possibly on the Vengurla Rocks.

(470) **Black-bellied Tern *Sterna acuticauda*** J. E. Gray

(*Sterna melanogaster*)

Status: Vagrant. **Sighting**: Three birds in breeding plumage were observed by the author (1999a) at the ZAC reservoir on 7th September 1988. Possibly the same birds were encountered again when four days later 27 birds, at least four of them in breeding plumage, were seen at Tadri harbour, Uttar Kanara, Karnataka, *ca.* 100 kilometres south of the site of first observation.

(471-3) **Bridled Tern** *Sterna anaethetus* Scopoli

(Brown-winged Tern)

First recorded on 25th September 1988, when two birds were seen heading south off the Chapora Fort. **Status**: A regular offshore autumn passage migrant in very large, but highly fluctuating numbers. **Habitat**: Coastal waters in a very wide swath from about 100 metres inshore to at least 11 kilometres off the coast. **Breeding status**: Since Hume (1876) reported to have found mummified birds and addled eggs, these terns were known to breed during the southwest monsoon on Burnt Island, one of the islets forming the Vengurla Rocks, *ca.* 16 kilometres off the coast between Vengurla and Malwan (Sindhudurg distr., Maharashtra) and 32 kilometres north of the Goa border, though in unknown numbers. A visit on 16th August 1998 established that at least 3000 Bridled Terns were breeding there, a number that is insufficient to account for the extent of the migration observed off Goa. **Migration, population and seasonal status**: Northward spring migration was observed only in 1997, with at least 56 individuals from 15th – 27th May, and 2001, with over 510 birds from 22nd – 24th May. Southward autumn passage usually starts in mid to late August (earliest record: 19th June). By mid-September a massive movement sets in, with birds passing several kilometers offshore at peak rates of up to 2694 individuals per hour. This large-scale migration slows down towards late September and peters out in the first week of October (latest record: 11th). The number of birds counted during regular 'seabird watches' at Anjuna was:

1996 at least 20232 birds between 29th August and 5th October			
1997	9048	27th August	3rd October
1998	10010	11th August	11th October
1999	3360	19th June	20th September
2000	2730	12th August	14th September

(474) **Sooty Tern** *Sterna fuscata* Linn.

First recorded on 25th September 1988 off the Chapora coast. **Status**: Small to moderate and capriciously fluctuating numbers of this uncommon, but regular offshore passage migrant participate in the annual autumnal mass migration of terns. **Habitat**: This pelagic tern is exclusively found in offshore waters at a distance from about 200 metres to at least four kilometers, with a preference shown for the middle distance of about two kilometres. **Breeding status**: The Sooty Tern was thought to be a breeder in the Vengurla Rocks, 32 kilometres north of Goa (Abdulali 1939, Ali and Ripley 1983, Harrison 1985, Grimmett *et al.* 1998, Kazmierczak 2000). This was shown to be based on a mere assumption underpinned by flimsy evidence (Lainer *in prep.*). **Migration, population and seasonal status**: No northward spring migration was observed. Autumn passage begins variously between 13th and 31st August and ends between 28th September and 3rd October. Up to 200 adult and juvenile birds travel south during this period either immersed in the stream of Bridled Terns or, more commonly, on their own in singles and twos.

(458) **Whiskered Tern** ***Chlidonias hybridus*** (Pallas)

First recorded on 7th September 1984 at the Parxem-Agarwaddo marshes. **Status**: A fairly common dry season visitor to wetlands of the coastal belt. Rare, but possibly overlooked, offshore spring and autumn passage migrant and scarce monsoon visitor. **Habitat**: Mainly found at freshwater ponds, tanks, marshes and flooded paddy-fields, not infrequently at brackish and saline marshes and lagoons, rarely in estuaries and offshore. **Sites**: Parxem-Agarwaddo* (Pernem), Chapora estuary, Baga fields, off Anjuna (Bardez), Divar-Chorao mudflats, Batim tank, Carambolim lake and paddy-fields***, Ciba-Geigy, Neura wetlands, Pilar pond, Zuari estuary at Agassaim, Santa Cruz creek (Tiswadi), ZAC reservoir, Velsao tank (Marmagoa), Curtorim tanks** and paddy-fields (Salcete). **Population**: Usually encountered in single-digit groups though gatherings of up to 25 individuals are fairly common, especially during autumn passage in September and October. The highest number counted at a single wetland was 55 birds at the Carambolim lake, on 24th May 1996. **Seasonal status**: Recorded throughout the year. **Migration**: Spring passage in March, April, May and June is a subdued affair while autumn passage migration in September and October is pronounced. During offshore migration, in April and September, loose groups of up to 54 birds skim the waves, closely hugging the contours of the coast. **Plumage**: Whiskered Terns in non-breeding plumage and juveniles are encountered throughout the year. Birds in full breeding plumage were seen from March through September while partial breeding plumage and moult was observed from April through October.

(459) **White-winged Tern** ***Chlidonias leucopterus*** (Temminck)

(White-winged Black Tern)

First reported by Willoughby (1993), who observed a single bird along the Mandovi on 21st March 1993. **Status**: A rare autumn and winter visitor to two sites in the coastal belt of North Goa. **Habitat**: Tidal mudflats and lagoons in estuaries and freshwater tanks. **Other sightings**: Holt (1998a) and a party of visiting British birders saw an adult individual in winter plumage at the Carambolim lake, on 6th February 1998, and Spalding (1998) possibly the same bird, on 18th March 1998. Frost, Manville and the author observed among a multitude of other terns a single bird that was moulting from summer into winter plumage on tidal mudflats at Navelim on Divar island, in the inland estuary of the Mandovi, on 18th August 1998. A bird in identical plumage and two individuals in either first summer or adult winter plumage were seen by Frost, Harvey D'Souza and the author on 13th September 1999 at the same locale. By 17th September 1999, the numbers had increased to two adult birds in moult and three first summer juveniles. A single adult with vestiges of breeding plumage was present on the same mudflats on 3rd October 1999.

(459a) **Black Tern *Chlidonias niger*** Linn.

First recorded on 13th September 1999 at the tidal mudflats of Divar-Navelim, in the inland estuary of the Mandovi, where a first summer juvenile bird was seen amongst White-winged, Whiskered and Gull-billed Terns by Frost, Harvey D'Souza and the author. **Status**: Vagrant. **Habitat**: Tidal mudflats and saline lagoons in estuaries. **Other sightings**: On 15th October 1999, the author observed another or the same juvenile specimen in the midst of a multitude of other terns on mudflats in the estuary of the Chapora river. **Remarks**: Ali and Ripley (1983) acknowledge a sight record near Delhi, in October 1949, as the only known occurrence in the Indian subcontinent. Grimmett *et. al.* (1998) list the Black Tern a rare, possibly overlooked passage migrant with six unspecified records in the subcontinent: three from NW-India, two from the Coromandel Coast and one from Sri Lanka's west coast. The overall status of the Black Tern in the Indian subcontinent is in doubt since Pamela Rasmussen re-examined all the specimens and found none standing up to scrutiny (Rasmussen *pers. comm.* to Holt 2000).

ACCIPITRIDAE
Osprey, Hawks, Eagles, Harriers and Vultures etc.

(203) **Osprey *Pandion haliaetus*** (Linn.)

First reported by Grubh and Ali (1976), who noted it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: An uncommon but regular winter visitor to the coastal belt and up to 15 kilometres inland in the river basins. **Habitat**: Preferred biotopes are estuaries; tidal rivers and creeks as well as saline, brackish and, to a lesser extent, freshwater marshes; rarely seen at tanks, pools and saltpans and only exceptionally up to 100 metres offshore. **Sites and sightings**: Terakol, Parxem-Agarwaddo**, Morjim (Pernem); Chapora estuary, Siolim, off Anjuna, Baga creek***, Candolim, Pilerne, Nerul creek, Sinquerim (Bardez); Chorao, Divar*, Naroa, Ciba-Geigy, Carambolim wetlands, Batim, Neura wetlands, Cumbarjua canal, Santa Cruz creek (Tiswadi); ZAC reservoir, Velsao (Marmagoa); Velim, Curtorim, Rachol (Salcete); Betul (Quepem). There is an exceptional sighting of a single bird at the Bondla WS, on 26th November 1998 (Holt 1998b). **Population**: The vast majority of the altogether 104 sightings by Frost and the author are of singles, five are of two birds and one sighting of three. **Seasonal status**: Recorded in all months. The season's visitors appear in October (earliest record: 13th September) and leave in March (latest record: 15th April). Occasionally an immature bird stays on during the southwest monsoon.

(127-8a) **Black Baza *Aviceda leuphotes*** (Dumont)

(Indian Black-crested Baza, Black-crested Baza, Indian Black-crested Lizard Hawk)

First reported by the author (1999a), who observed a single bird near Mairem in the Bhagwan Mahavir WS, on 26th March 1987. **Status**: Uncertain. The only four sightings of the Black Baza in Goa leave open the possibility of it being either a very rare stray or dry season visitor or resident of the base and crest of the Western Ghats (up to *ca.* 500 metres). **Habitat**: Dense wet evergreen forest near the crest, tall semi-evergreen and evergreen riverine forest at the foot of the Ghats. **Sightings**: A single bird was seen on 30th March 1989 only a couple of hundred metres from the site of the first sighting in 1987. One individual was observed as it flew over a forest clearing near Tirval, in the Cotigao WS, on 31st December 1999. One more, or the same bird was spotted in forest on 27th December 2001, only a couple of hundred metres from the site of the 1999 sighting. Dennis (1999) saw a single near Backwoods Camp, on 6th December 1999. **Remarks**: The strange symmetricity, in time as well as locality, of the four records suggests that the Black Baza could possibly be a resident at the two sites.

(129-30) **Oriental Honey-buzzard *Pernis ptilorhyncus*** (Temminck)

(Crested Honey-buzzard, Oriental Honey-Buzzard, *P. ptilorhynchus*)

First reported by Grubh and Ali (1976), who collected a specimen of the subspecies *P. p. ruficollis* at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: Widespread and fairly common to uncommon dry season visitor and scarce resident, from the seashore to the base of the Western Ghats; absent from the slope and rare on the crest of the Ghats. **Habitat**: This raptor is encountered in a wide variety of habitats, ranging from saline wetlands with groves of large trees in the vicinity to the evergreen and semi-evergreen forests of the Ghats. **Sites**: Terakol, Tuem-Vironda (Pernem); Sodiem, Siolim, Chapora fort, Assagao, Anjuna, Nagoa, Arpora, Baga creek, Saligao, Tivim-Damedem, Calangute, Candolim, Fort Aguada (Bardez); Mayem lake (Bicholim); Anjunem, Surla, Nanorem (Sattari); Chorao, Divar, Batim, Carambolim, Ciba-Geigy, Santa Cruz, Dona Paula (Tiswadi); Bondla WS (Ponda); Mollem, Collem, Bhagwan Mahavir WS (Sanguem); Velsao (Marmagoa); Curtorim (Salcete); Gaodongrem, Cotigao WS (Canacona). **Population**: Sightings of single birds are the norm, but twos and threes are occasionally seen. The overall population appears to be steady, but in the coastal belt a decline is clearly noticeable since the mid-eighties. **Breeding status**: There is enough circumstantial evidence of this raptor's breeding (in the dry season), but direct proof is still absent. **Seasonal status**: Recorded in all months but June and August. Oriental Honey-buzzards leave in April, before the onset of the southwest monsoon (latest record: 16th May), and return in October (earliest record: 17th September).

There are two exceptional sightings in July, when the monsoon is at its peak, from the Cotigao WS.

(124) **Black-shouldered Kite** ***Elanus caeruleus*** (Desfontaines)
(Black-winged Kite)

First reported by Grubh and Ali (1976), who observed it at Mayem and Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. Saha and Dasgupta (1992) collected two specimens at the Cotigao WS and Valpoi, in February and March 1978, and ascribed them to the subspecies *E. c. vocif-erous*. **Status**: Uncommon dry season visitor mainly to the coastal belt and river basins, scarce in the midland region and fairly common at the foot of the Western Ghats. Saha and Dasgupta (1992) rated this species as 'common in Goa, particularly in the deciduous forest along rivers or large waterpools' in the sixties and seventies. **Habitat**: Open tracts of land, cultivation in forest clearings, fallow paddy-fields, pastures, grassland, wasteland and saline marshes. **Favoured sites and sightings** (by Frost, Holt and the author): Divar (10 sightings), Bhagwan Mahavir WS (9), Baga creek (4), Saligao/Parra/Sangolda/Guirim paddy-fields (6), **Other sites** (one or two sightings): Morjim (Pernem); Assagao-Badem, Baga/Anjuna hill, Pilerne, Sinquerim (Bardez); Surla, Santtrem, Valpoi (Sattari); near Panaji, Santa Cruz, Batim, Neura wetlands, Carambolim Dadda Dongrim, Ciba-Geigy (Tiswadi); near Bondla WS (Ponda); ZAC reservoir (Marmagoa); Chinchinim (Salcete); Chauri, Gaodongrem, Cotigao WS (Canacona). **Population**: All 58 sightings were of single birds. **Seasonal status**: Recorded in all months except July. This raptor usually stays on until a couple of days before the onset of the southwest monsoon (latest seasonal record: 7th June) and returns as soon the rains let up a bit (earliest autumn record: 31st August).

(132-4) **Black Kite** ***Milvus migrans*** (Boddaert)
(Pariah Kite, Black-eared Kite)

First reported by Grubh and Ali (1976), who noted it in urban areas during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: Very common and nearly ubiquitous dry season breeding visitor of the coastal belt and the river basins, fairly common and locally abundant in the midlands and rare at the base of the Western Ghats. **Habitat**: The Black Kite is liable to turn up anywhere in Goa and in any type of habitat, except in the forests of the Western Ghats. **Popu-lation and favoured sites**: Typical day counts range from 5 to 40 birds. Large con-gregations are regularly encountered at the Goa Meat Complex abattoir near Usgao (up to 80+), a refuse tip near Old Goa (up to 120+) and at the ZAC reservoir (up to 300+). At least 114 birds were seen attending to clam diggers on exposed tidal mudflats in the Chapora estuary. The numbers of this species appear to be in slow but steady decline since the mid-nineties, especially in urban areas. **Breeding sta-**

tus: There is only a single record of this raptor's breeding in Goa – a brood was successfully raised next to the Ciba-Geigy factory compound, from January to April 2000. **Seasonal status**: Recorded in all months. This raptor is a typical monsoon fugitive and an accurate indicator of the approaching rains. It leaves usually six or seven days ahead of the advancing southwest monsoon and returns in early September. Any break in the rains lasting more than four or five days brings back a few birds. On the other hand, any unseasonally excessive rain in September will drive away already returned birds. **Migration**: Up to 50+ northbound migrants within 10 minutes were counted at the beginning of June. The return movement in September is slower and less pronounced, with up to 28+ southbound birds registered within 30 minutes. In both cases, the migration follows a hardly one kilometre wide path along the coastline.

(135) **Brahminy Kite *Haliastur Indus*** (Boddaert)

First reported by Grubh and Ali (1976), who noted it at the Mayem lake environs during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: Very common and widespread, locally abundant breeding resident; almost ubiquitous in the coastal belt and the river basins, as far as tidal influence reaches; uncommon in the midland region and absent from the Western Ghats. **Habitat**: From up to 2-3 kilometres offshore to rivers on the eastern rim of the midlands, any habitat that is not too far from some waterbody will be frequented by this very catholic species. **Population and favoured sites**: Usual day counts during dry season are 20 to 50 birds. Larger assemblies are regularly noted at the ZAC reservoir (up to 300+ birds) and the Carambolim lake in May when it has dwindled to a puddle (up to 150+). Other points of congregation for up to 35+ birds are *rampons* (or beach sein-nets), tidal mudflats in estuaries and waterholes in fallow fields. **Unusual sites**: Bondla WS (two sightings by Holt); rivers, paddy-fields and clearings in the Cotigao WS (5) and near Neturlim, right at the foot of the Ghats (1). **Breeding status**: Breeding season starts in late February and extends into the southwest monsoon. A second clutch of eggs is occasionally laid in August. **Seasonal status**: Recorded throughout the year. The number of Brahminy Kites declines sharply during the southwest monsoon.

(173) **White-bellied Sea Eagle *Haliaeetus leucogaster*** (Gmelin)

First observed at Cabo de Rama, where at least six birds were observed on 20th July 1980. **Status**: A fairly common, locally common, breeding resident all along Goa's coastline. **Habitat**: This eagle forages up to 1.5 kilometre offshore and breeds up to three kilometres inland. In this narrow, only 4.5 kilometres wide strip it might turn up anywhere in-between. In the river basins, it is found up to 13 kilometres from the river mouth. **Unusual sites**: Four kilometres upriver from Amone in the Cotigao WS (*ca.* 15 kilometres from the coast); Selaulim lake (*ca.* 24 kilometres

from the coast). White-bellied Sea Eagles are frequently seen sailing above the streets of Panaji, Goa's capital. **Population**: An estimated minimum of 50-70 birds, adult and juvenile, are present in Goa at any given time. **Breeding status**: A minimum of 16 pairs breed annually at the following sites: Mandrem, Nagoa valley, Reis Magos, St. George's Island, Issorcim-Hollant, Betul, Canaguinim, Cabo de Rama, Agonda, Talpona and Polem. Nests at Anjuna-Vagator and Malim are only occasionally occupied. The breeding season extends from mid-October, when incubation starts, to early April, when the fully-fledged nestlings leave the nest.

(175-6) **Grey-headed Fish Eagle** ***Ichthyophaga ichthyaetus*** (Horsfield)

(Greater Grey-headed Fish Eagle, Grey-headed Fishing Eagle)

Status: Vagrant. **Sighting**: A sub-adult bird was seen by the author (1999a) at the ZAC reservoir, a freshwater lake atop a coastal lateritic plateau near Sancoale, on 16th November 1987.

(186-7) **Egyptian Vulture** ***Neophron percnopterus*** (Linn.)

(Indian Scavenger Vulture)

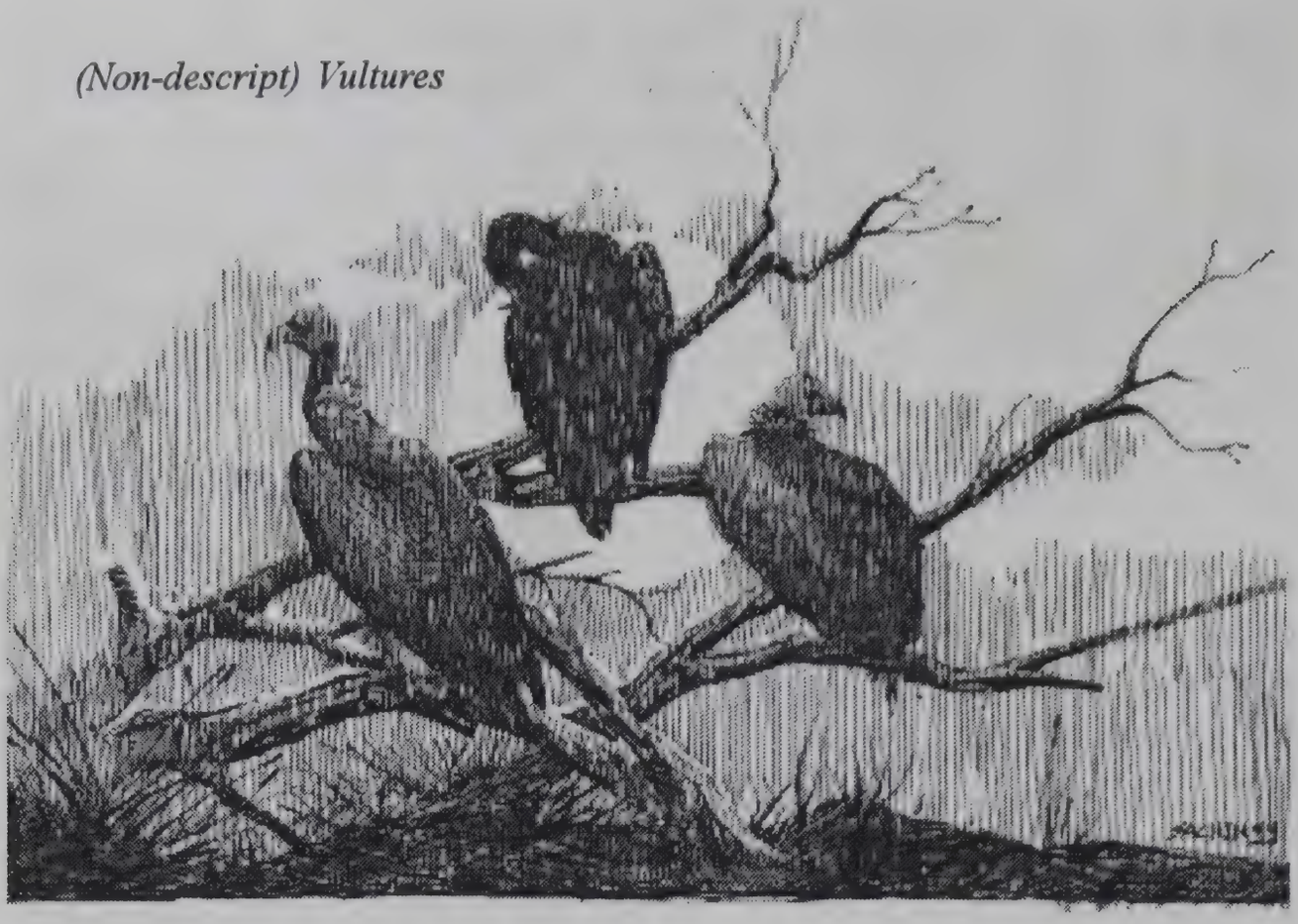
First recorded by Holt (1996b), who observed a juvenile bird at the Goa Meat Complex abattoir, near Usgao, on 13th December 1996. **Status**: Probably a stray from the adjacent Deccan Plateau. **Other sightings**: Welland (2000) recorded three birds on 11th December 1995 and Willoughby (1997) two immatures at the Goa Meat Complex, on 16th February 1997. The author (1999a) saw an adult specimen soaring above the Dudhsagar waterfalls, on the border to Karnataka, on 26th December 1997.

(185) **White-rumped Vulture** ***Gyps bengalensis*** (Gmelin)

(Indian Whitebacked Vulture, Oriental White-backed Vulture, White-backed Vulture, Bengal Vulture)

First reported by Grubh and Ali (1976), who noted the species at Canacona during their ornithological survey of Goa from 27th November – 12th December 1972. **Status**: Critically endangered. From an uncommon resident or year-round visitor in the entire state this species has declined, sometime in the mid- or late nineties, to the status of a rare visitor to the eastern rim of the midland region and the Western Ghats. **Habitat**: As a scavenger on animal carcasses this bird is liable to appear in any biotope or environment. **Favourite sites**: The refuse dump next to the abattoir of the Goa Meat Complex near Usgao regularly attracts the greatest numbers (up to 120) of these vultures. **Population**: Throughout the eighties and into the mid-nineties, groups of up to 38 White-rumped Vultures could be seen at carcasses anywhere in Goa. After the Goa Meat Complex near Usgao started operations sometime in the mid-nineties, large numbers of these vultures were attracted to it, e.g. 120 birds

(Non-descript) Vultures



in February 1996, 100 and 80 in December 1996 (Holt 1996b) and 70 in December 1997 (Holt 1997). The fact that similar numbers of these birds were observed soaring high over the Bondla WS and the ridge of the Western Ghats, heading either in a western or eastern direction, points to their origin from somewhere beyond the Ghats, probably from the adjacent Deccan Plateau. Beginning in 1997, a rapid decline of the population was noted, first in the widely roving groups and, from 1998 onwards, even in the congregations at the abattoir. **Seasonal status**: Recorded throughout the year.

(182, 184) **Long-billed Vulture** ***Gyps indicus*** (Scopoli)

(Indian Longbilled Vulture)

First reported by Claydon (1993), who observed the species at Kiranpani on 26th and near Mollem on 27th November 1993. **Status**: Uncertain. This critically endangered species is probably a scarce visitor to the midland region and the base of the Western Ghats. **Sites and sightings**: Holt (*in litt.* 2000) lists 11 sightings by him from Bondla WS (6), the Goa Meat Complex (3) and Carambolim (2). Various other observers have reported sightings of this species, many of them of doubtful value. **Population**: Most sightings are of singles and twos. Groups and flocks of 5, 6, 10 and *ca*. 40 individuals have been recorded once each. **Seasonal status**: All records date from January, February, March, April, November and December. **Habitat**: Since all sightings were of birds on the wing, either passing over or soaring high overhead, it is impossible to single out any preferred biotope. **Sites and sightings**: The Nagoa hill with six sightings appears to be the most favoured site followed by Divar and

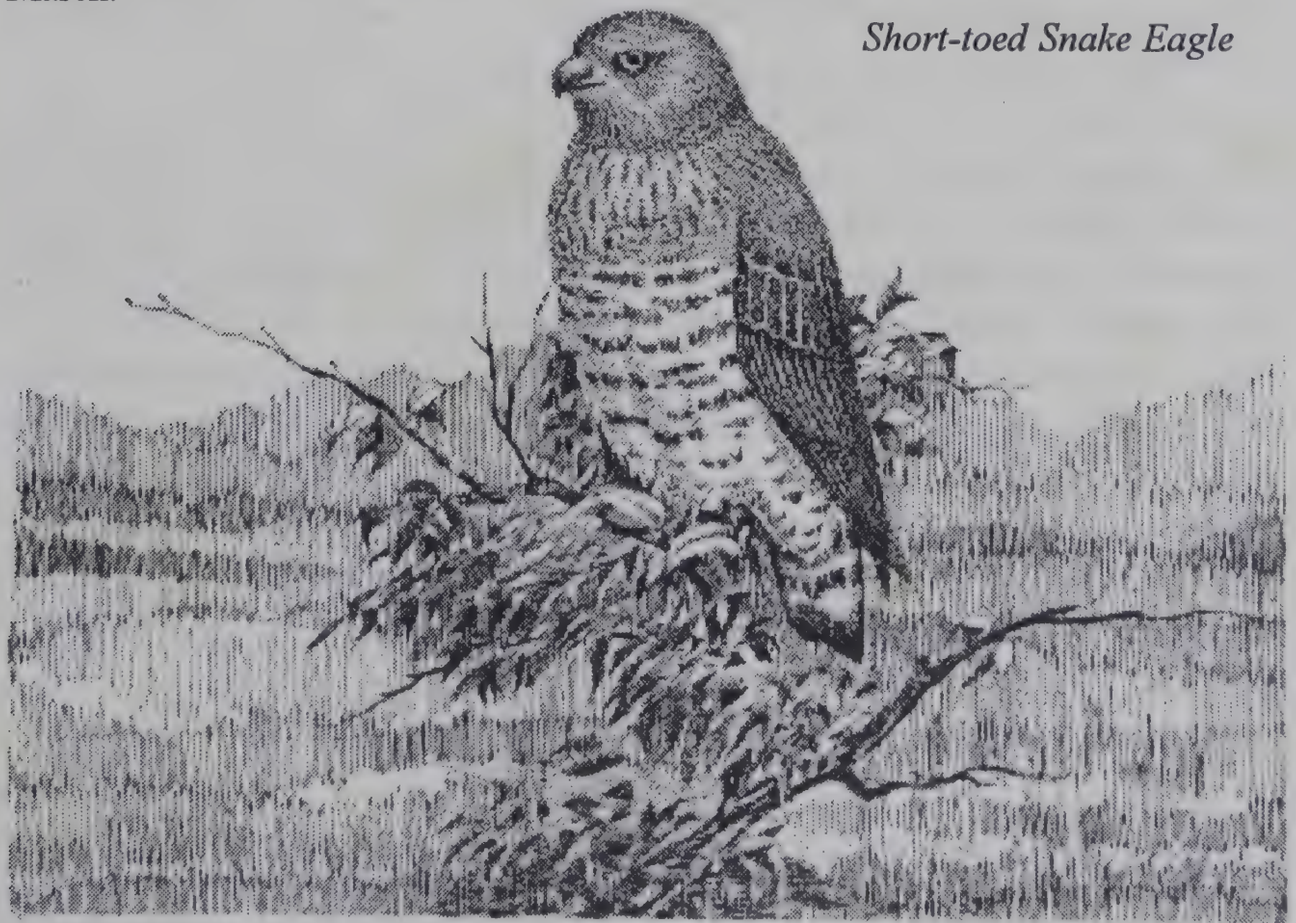
the Carambolim grasslands with two each. Single sightings were made at Mandrem, Baga creek, Aguada hill, Chorao, Cumbarjua canal, Santa Cruz, Dona Paula and Cotigao WS. **Observers**: Addey (1995), Dennis (1999), van der Dol (1999), Frost (pers. comm.), Griggs (1996), Holt (1997, 1998a), Jännes (1997), Sykes (1999), Wadsworth (2000), van der Wielen (1998) and the author. **Population**: There are 26 sightings from 12 years between 1982 and 2000, all of single birds except one, which was of two specimens. **Seasonal status**: The earliest autumn record is on 28th October, the latest spring sighting from 21st March.

(195) **Short-toed Snake Eagle** *Circaetus gallicus* (Gmelin)

(Short-toed Eagle)

First recorded on 24th February 1982 at Arpora. **Status**: A scarce winter visitor to the coastal belt and river basins. **Habitat**: Since all sightings were of birds on the wing, either passing over or soaring high overhead, it is impossible to single out any preferred biotope. **Sites and sightings**: The Nagoa hill with six sightings appears to be the most favoured site followed by Divar and the Carambolim grasslands with two each. Single sightings were made at Mandrem, Baga creek, Aguada hill, Chorao, Cumbarjua canal, Santa Cruz, Dona Paula and Cotigao WS. **Observers**: Addey (1995), Dennis (1999), van der Dol (1999), Frost (pers. comm.), Griggs (1996), Holt (1997, 1998a), Jännes (1997), Sykes (1999), Wadsworth (2000), van der Wielen (1998) and the author. **Population**: There are 26 sightings from 12 years between 1982 and 2000, all of single birds except one, which was of two specimens. **Seasonal status**: The earliest autumn record is on 28th October, the latest spring sighting from 21st March.

Short-toed Snake Eagle



(196-200) **Crested Serpent Eagle *Spilornis cheela*** (Latham)

First reported by Grubh and Ali (1976), who collected a specimen of the subspecies *S. c. melanotis* at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A fairly common and widespread resident of all three regions, from coastal headlands to the crest of the Western Ghats. **Habitat**: All kinds of woodlands from evergreen to moist deciduous and secondary forest, well-wooded villages, orchards and groves of fruit trees, wetlands and paddy-fields fringed by tall trees etc. **Sites**: Arambol (Pernem); Chapora headland, Sodiem, Siolim-Marna, Tivim-Damedem, Assagao, Nagoa valley, Baga creek, Saligao valley (Bardez); Anjunem dam, Surla, Valpoi, Nanorem (Sattari); Batim, Carambolim lake (Tiswadi); Bondla WS (Ponda); Sancoale, Velsao (Marmagoa); Sancordem, Bolcornem, Kalay Dongor, Collem, Mollem, Bhagwan Mahavir WS (Sanguem); Curtorim, Orlim (Salcete); Shirotim, Gaodongrem, Cotigao WS (Canacona). **Population**: Though this species is usually encountered singly or in pairs, loose groups of up to at least four birds at a single site are not uncommon. **Breeding status**: This raptor almost certainly breeds in Goa and juvenile birds are frequently seen but direct proof of breeding is still absent.

(193-4) **Eurasian Marsh Harrier *Circus aeruginosus*** (Linn.)

(Western Marsh Harrier, Western Marsh-Harrier, Marsh Harrier)

First observed on 11th October 1980 at Calangute. **Status**: A widespread and fairly common, locally common dry season visitor to wetlands in the coastal belt and river basins, scarce in the midlands and rare at the base of the Western Ghats. **Habitat**: This species is found in a wide variety of saline, brackish and freshwater wetlands, over standing paddy etc. and even over woodlands and forest glades. **Unusual sites**: 100 metres off the coast at Anjuna; barren plateau at Dabolim; Tirval paddy-fields in the Cotigao WS; along the main road between Collem and Mollem; high over the Bondla WS. **Population**: Day counts of up to 10 birds (16+ specimens were counted at the Tiswadi wetlands of Carambolim, Neura, Ciba-Geigy and Divar on 3rd November 2000) are not unusual and up to 8+ can be seen at single wetlands (8+ at Divar on 10th January 1988 and 8+ at Neura on 3rd November 2000). The majority of the birds are juveniles. **Seasonal status**: Birds arrive usually in mid- and late September (earliest record: 3rd) and leave during April (latest record: 13th May). An offshore record and several sightings at unusual sites in September suggest a moderate autumn passage. There is an unseasonal record of an adult female at Divar, on 9th August 2000.

(190) **Pallid Harrier** *Circus macrourus* (S. G. Gmelin)

(Pale Harrier)

First recorded on 8th January 1981 near the ZAC reservoir. **Status**: Uncommon, locally fairly common winter visitor to the coastal region and river basins. **Habitat**: Grassland, pastures, stubble fields, grassy plateaus, wetlands with emergent vegetation like sedges and reeds. **Favoured sites and sightings**: Divar-Navelim and Divar-Goltim (29 sightings), Baga area (18), Carambolim grassland and lake (6), Santa Cruz creek and paddies (3), Neura wetlands (3), ZAC reservoir (3). **Other sites** (one or two sightings): Parra-Guirim fields, Fort Aguada, Dona Paula, Maem Todi tank and Velim lake. **Population**: The majority of the altogether 55 sightings was of singles, three of 2 birds, two of 3, two of 4 and one of 5 birds. **Seasonal status**: Pallid Harriers are present from late September (earliest record: 9th) to mid-February (latest record: 8th March). The highest number of sightings dates from September-October, suggesting the passage of autumn migrants.

(192) **Pied Harrier** *Circus melanoleucos* (Pennant)

(*C. melanoleucus*)

Status: Vagrant from Northeast India. **Sightings**: An adult male was observed by the author (1999a) over stubble fields at Divar-Piedade, on 23rd December 1989. Harvey D'Souza (pers. comm.) recorded a single male bird over wasteland at Alto Porvorim, on 19th February 2003 and over fallow paddy-fields at Pilerne, on 26th March 2003, while quite a number of visiting birders saw the (presumably same) bird at various places of coastal Bardez during the same period.

(191) **Montagu's Harrier** *Circus pygargus* (Linn.)

First observed on 18th January 1983 on the plateau surrounding the ZAC reservoir at Sancoale. **Status**: A scarce and irregular winter visitor to the coastal belt and river basins; exceptionally found at the foot of the Western Ghats. **Habitat**: Barren and grassy lateritic plateaus, treeless grasslands and saline sedge marshes. **Sites and sightings**: ZAC reservoir (4 sightings), Divar-Navelim (3), Carambolim paddies and grasslands (2), Neura wetlands (1), Anjuna-Vagator hill (1), Bhagwan Mahavir WS (1). **Observers**: Frost (pers. comm.), Holt (1997), Rodgers (1997), van der Wielen (1998) and the author. **Population**: Of the 12 sightings in 19 years one was of a pair, the remaining of single birds, four of them adult males, four of juveniles and one of a female bird. **Seasonal status**: Observed between 3rd October and 15th February.

(144-6) **Crested Goshawk** *Accipiter trivirgatus* (Temminck)

First recorded by Grubh and Ali (1976), who noted it at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. Saha and Dasgupta (1992) collected a female specimen in the Bondla WS, on 6th October

1977, and ascribed it to the subspecies *A. t. peninsulae*. **Status**: A scarce dry season visitor or resident (?) of the Western Ghats, from foothills to crest. **Habitat**: Restricted to evergreen and semi-evergreen forest. **Sites and sightings**: Bhagwan Mahavir WS (6 sightings); Bondla WS (5); Cotigao WS (3). There are a good number of sightings by visiting birders, many of them from highly improbable coastal sites. **Observers**: Frost (pers. comm.) and the author. **Population**: Probably not more than three to four pairs are found at any given time within Goa's boundaries. **Breeding status**: Courtship display was observed on five occasions between 5th April and 17th May though no other indications of breeding were noted. **Seasonal status**: Not yet recorded in March and during the monsoon months of June, July and August.

(137-40) **Shikra** ***Accipiter badius*** (Gmelin)

(Indian Sparrowhawk)

First reported by Grubh and Ali (1976), who collected specimens of the subspecies *A. b. dussumieri* at Mollem and Valpoi during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: This until about 15 years ago fairly common breeding resident has numerically declined to such an extent that it has to be termed as uncommon now. Found in all three zones, from the seashore to the base of the Western Ghats. **Habitat**: Found in all kinds of woodland – evergreen, semi-evergreen, moist deciduous and secondary – as long as it is not too dense, forest clearings, open tracts and fields with a scattering of trees, well-wooded villages, orchards and stands of old fruit trees, scrub jungle etc. **Population**: The population is diminishing steadily since the mid-eighties. The decline is steepest in the coastal region and least felt in the Western Ghats strip. **Breeding status**: A pair feeding three fledglings was observed in early August in the coastal belt. Mating was observed in March in the Western Ghats and April in the coastal belt.

(149-51) **Besra** ***Accipiter virgatus*** (Temminck)

(Besra Sparrowhawk)

First reported by Rane (1982), who noted it near Mollem during one of his Goa trips from 18th – 24th May 1981, 6th – 10th April and 16th – 22nd June 1982. **Status**: The frequently misidentified Besra is a scarce resident of the Western Ghats, from foothills to the crest, rare visitor or resident in the midland region and very rare visitor to the coastal belt. **Habitat**: Wet evergreen, semi-evergreen and primary moist deciduous forest in the Ghats strip, remnant semi-evergreen woodland and mango topes in the coastal strip. **Western Ghats sites**: Surla, Bhagwan Mahaveer WS, Bondla WS and Cotigao WS. **Coastal belt sites**: Nagoa valley, Tivim-Damedem, dam of Carambolim lake. **Observers**: Frost (pers. comm.) and the author. **Population**: 15 birds (three of them juveniles) were recorded in 15 sightings from 1982 to 2001. **Seasonal status**: Not yet recorded in March and July.

(147-8) **Eurasian Sparrowhawk** *Accipiter nisus* (Linn.)

(Northern Sparrowhawk, Sparrowhawk)

First recorded on 28th October 1981 at the Dudhsagar waterfalls in the Bhagwan Mahavir WS. **Status**: A rare winter visitor to the Western Ghats and its outlying hills, from the base to the crest, and to the coastal belt. **Habitat**: Fringes of wet evergreen forest; semi-evergreen and moist deciduous forest; open woodland; grassland and stubble fields with a scattering of trees and bushes. **Coastal belt sites**: Arpora-Baga, Nagoa valley and Saligao spring. **Western Ghats sites**: Kalay, grassland between Mollem and Collem, Bhagwan Mahavir WS. **Observers**: Frost (pers. comm.), Holt (1999) and the author. **Population**: 9 individuals (two of them juveniles) were recorded in 8 sightings spanning the years from 1981 to 2000. **Seasonal status**: The earliest of this winter visitor was seen on 28th October, the latest on 2nd April.

(157) **White-eyed Buzzard** *Butastur teesa* (Franklin)

(White-eyed Buzzard Eagle, White-eyed Hawk)

First reported by Saha and Dasgupta (1993), who collected a female specimen five kilometres east of Margao, on 18th December 1968. **Status**: An uncommon winter visitor to all three zones, from a couple of kilometres behind the seashore to the foot of the Western Ghats; commonest in the coastal belt. **Habitat**: Fallow paddy-fields, pastures and open tracts of land with a scattering of larger trees, 'islands' of paddy cultivation and clearings in closed forest. **Favoured sites**: Bondla WS (6 sightings), Cotigao WS (4) and Nagoa valley and hill (3). **Other sites** (one or two sightings): Arpora-Baga fields, Verla-Canca, Monte Guirim, Saligao fields, Tivim-Damedem, Valpoi area, Chorao-Tikanem, Mayem lake area, Bhagwan Mahavir WS, **Observers**: Frost (pers. comm.), Holt (1999) and the author. **Population**: Of the altogether 28 sightings, 26 were of singles and only two of 2 birds. Juvenile and immature specimens form the majority of sightings. **Seasonal status**: Recorded between 18th October and 9th March.

(155-6) **Common Buzzard** *Buteo buteo* Linn.

(Buzzard, Eurasian Buzzard, Desert Buzzard)

First observed by Holt (1996a) soaring on thermals over Fort Aguada, on 11th January 1996. **Status**: Scarce winter visitor to the coastal belt and river basins of North Goa **Sites and sightings**: The preferred site appear to be the Candolim pastures with six sightings by Frost (pers. comm.), Holt (1996b, 1997, 1998b) and the author, followed by Fort Aguada with five sightings by Holt (1996b, 1997, 1998b) and the Baga creek area with three sightings by Holt (1999) and the author. Single sightings come from Pilerne (Frost pers. comm.) and the Bondla WS (Holt 1997). **Population**: Of the altogether 17 sightings 16 were of single birds and one of two. **Seasonal status**: All sightings date from between 31st October and 18th March.

(153) **Long-legged Buzzard *Buteo rufinus*** (Cretzschmar)

First recorded by Manville (pers. comm.), who observed an adult specimen at Candolim, in late December 1996. **Status**: A very rare winter visitor to two sites in the coastal belt of North Goa. **Habitat**: Stubble fields interspersed with pastureland in the vicinity of stands of large fruit trees. **Sightings**: The bird that was first observed by Manville in late December 1996 remained at the site until 27th February 1997 (and possibly longer). An adult and an immature bird were present at the same site from at least 8th to 18th February 1999. Frost (pers. comm.) saw an adult dark phase specimen at Verla-Canca, on 29th November 1999.

(172) **Black Eagle *Ictinaetus malayensis*** (Temminck)

First recorded by Grubh and Ali (1976), who sighted one bird in Canacona *taluka* during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: An uncommon dry season visitor to all regions, from close behind the seashore to the crest of the Western Ghats. **Habitat**: Evergreen and semi-evergreen forests and stands of tall trees with a closed canopy, wooded slopes of plateaus etc. **Favoured sites**: Bhagwan Mahavir WS (20 sightings), Bondla WS (14), Nagoa hill and valley (11). **Other sites** (one or two sightings): Arambol (Pernem), Baga-Anjuna hill, Baga creek (Bardez), Surla (Sattari), Chorao, Carambolim-Dadda Dongrim, Ciba-Geigy, Carambolim lake (Tiswadi), Macasana (Salcete), Cotigao WS (Canacona). **Population**: 55 sightings were of single birds, five of two birds and one was of four. **Seasonal status**: Present usually from early November (earliest record: 3rd) to late March (latest record: 20th April).

(171) **Lesser Spotted Eagle *Aquila pomarina*** Brehm

First reported by Holt (1996b), who observed a single at the Carambolim grasslands on 10th December 1996. **Status**: A regular and locally fairly common winter visitor to a few sites in the coastal belt and river basins. **Habitat**: Areas of extensive grassland and stubble fields, large expanses of sedges in brackish or saline wetlands. **Sites and sightings**: Baga area (10 sightings), Carambolim grassland (10), Neura wetlands (6), Santa Cruz creek (4), Chorao-Tikanem (2) and Tivim-Damedem (1). **Observers**: Frost (pers. comm.), Holt (1996b), 1997, 1998b, 1999) and the author. **Population**: Most records are of juveniles. Singles and pairs are predominant, though four juvenile birds were regularly encountered in November 1998 at the Carambolim grassland and six juvenile birds throughout November 1999 at the Neura wetlands where the exceptional number of 23 individuals was counted by Holt (1999) on 5th November, probably on autumn passage migration. Many of the records are repeated sightings of the same birds, which have a tendency to stay at a site for a couple of weeks or so and then move on, often in a group, to the next. **Seasonal status**: Recorded between 31st October and 19th January.

(170) **Greater Spotted Eagle** *Aquila clanga* Pallas

(Spotted Eagle)

First recorded when a single bird was sighted at Divar-Navelim, on 29th October 1987. **Status**: A regular, fairly widespread and locally fairly common winter visitor to the coastal belt and river basins. **Habitat**: The habitat requirements of this species are more or less the same as the Lesser Spotted Eagles', but also include smaller wetlands and tanks. **Favoured sites** and sightings: Divar (7), Chorao (2), Carambolim area (25), Neura wetlands (9), Santa Cruz creek (11) and Baga area (10). **Other sites** (single sightings): Kiranpani, Parxem-Agarwaddo, Candolim marsh, over Bondla WS, Talaulim, Shiroda wetlands, Curtorim tanks. **Observers**: Claydon (1993), G. Featherstone, Frost (pers. comm.), Holt (1996a, 1996b, 1997, 1998a, 1998b, 1999), Manville, Willoughby (1993) and the author. **Population**: Nearly all records are of single birds, very few of twos and threes and only one of six birds. **Seasonal status**: Recorded between 22nd October and 20th March.

(169) **Steppe Eagle** *Aquila nipalensis* Hodgson

(*Aquila rapax nipalensis*)

First reported by Holt (1996a), who observed a single bird over Carambolim, on 10th December 1996. **Status**: Undetermined. Possibly a rare winter visitor. **Other sightings**: Holt (1997) observed single juvenile birds high over the Bondla WS on 9th November 1997 and near Chorao-Tikanem on 6th December 1997. Frost (pers. comm.) reported two adults at one of the Curtorim tanks on 7th February 2002.

(163) **Bonelli's Eagle** *Hieraaetus fasciatus* (Vieillot)

First recorded on 2nd March 1984, when a single bird was seen circling over the fields of Arpora. **Status**: A rare winter visitor to the coastal zone and river basins. **Sites and sightings:** A single specimen was recorded on 2nd January 1985 over fallow fields at Verla-Canca. Possibly the same bird was sighted on 1st February 1985 over the nearby stubblefields of Arpora-Baga. A bird observed by Harris (1998) on 16th November 1998 at the Carambolim lake was seen by the author on the same day at the adjacent Neura wetlands. Van der Dol (1999) spotted an immature bird over the Baga hill on 17th February 1999.

(164) **Booted Eagle** *Hieraaetus pennatus* (Gmelin)

(Booted Hawk Eagle)

First recorded on 1st February 1984 at the Baga creek. **Status**: A fairly common winter visitor to the coastal belt and river basins, only occasionally seen in the midlands and at the base of the Western Ghats. **Habitat**: Grassland and open tracts of land with a scattering of trees in the vicinity of wetlands; rarely encountered over forest. **Sites**: Arambol, Parshem-Agarwaddo, Morjim (Pernem); Gudem, Tivim-

Damedem, Arpora-Baga area, Saligao, Candolim, Pilerne, Fort Aguada (Bardez); Chorao, Divar, Carambolim, Ciba-Geigy, Santa Cruz, Dona Paula, Neura (Tiswadi); ZAC reservoir (Marmagoa); Velim (Salcete); Selaulim (Sanguem). **Unusual sites**: Bondla WS (8 sightings), Mollem (2) and Cotigao WS (1). **Population**: Day counts of between one and three birds are the norm. Up to a dozen were counted at the wetlands of Tiswadi taluka in December and 10+ birds at the ZAC reservoir, also in December. **Seasonal status**: Present from early October (earliest: 2nd) to mid-April (latest: 18th). **Migration**: Robson (1999) observed the passage of 11 birds within 90 minutes over the Baga ridge, on 16th November 1999. **Colour phases**: There is a wide discrepancy in the ratio of light to dark morphs reported by visiting birdwatchers (from 1:9 to 8:1). The resident birdwatchers' ratio works out to 3:1 (Frost pers. comm.) and 22:21 (author).

(165) **Rufous-bellied Eagle** ***Hieraaetus kienerii*** (E. Geoffroy)

(Rufous-bellied Hawk Eagle)

First reported by Willoughby (1993), who observed a single specimen near Mollem on 14th March 1993. **Status**: Apparently, this rare eagle strays occasionally into Goa from the adjacent large forests of North Kanara (Karnataka state). All records are from the base and crest of the Western Ghats in the Bhagwan Mahavir WS. **Habitat**: Wet evergreen and semi-evergreen forest. **Sites and sightings**: Holt (1996b) saw one bird over the Devil's Canyon trail on 12th December 1996. An adult was observed by Frost and Manville (pers. comm.) on the top of Dudhsagar waterfalls on 9th May 1997. The, presumably, same bird was spotted there repeatedly from 25th – 27th December 1997 and again on 1st February 1998 by the author. An immature specimen was recorded by the author on 16th April 1999 on Top of the Dudhsagar waterfalls. **Seasonal status**: Recorded in February, March, May and December.

(160-2) **Changeable Hawk Eagle** ***Spizaetus cirrhatus*** (Gmelin)

(Crested Hawk Eagle)

First recorded on 25th November 1982 at Caranzol in the Bhagwan Mahavir WS. **Status**: A scarce breeding resident of all three regions, from close to the seashore to the crest of the Western Ghats. **Habitat**: Evergreen and semi-evergreen forests of the Ghats and their outlying hills, remnant semi-evergreen woods in valleys on the scarp of plateaus. **Sites**: Nagoa valley***, Baga area, Saligao (Bardez); Bondla WS (Ponda); Mayem lake** (Bicholim); Bhagwan Mahavir WS* (Sanguem); Shirotim, Cotigao WS (Canacona). **Breeding status**: Breeding was recorded in February, March and April of 1997 and 1999, in the Nagoa valley. **Seasonal status**: Recorded in all months except July.

FALCONIDAE
Falcons

(222-4) **Common Kestrel *Falco tinnunculus*** Linn.
(Eurasian Kestrel, European Kestrel, Kestrel)

First reported by Saha and Dasgupta (1993), who collected a male specimen of the nominate race *F. t.* tinnunculus near Mollem on 2nd January 1969. **Status**: A fairly common and widespread winter visitor to the coastal belt and river basins, scarcer in the midland region and rare at the base of the Western Ghats. **Habitat**: A variety of open spaces like grassy lateritic plateaus, pastures, grassland, fallow paddy-fields etc. **Unusual sites**: Vagheri hill; 'islands' of paddy-fields in the riverine, semi-evergreen and evergreen forests of the Cotigao WS. **Seasonal status**: The Common Kestrel is present usually between mid-October (earliest record: 9th) and mid-March (latest record: 28th).

(220) **Amur Falcon *Falco amurensis*** Radde
(Manchurian Red-footed Falcon, Eastern Red-footed Falcon, Eastern Red-legged Falcon, Red-footed Falcon, *Falco vespertinus*)

First reported by Jännes (1997), who observed a male bird flying out to sea from Fort Aguada Beach Resort, on 15th November 1997. **Status**: A scarce, but by now probably annual autumn passage migrant through the coastal belt and river basins of North Goa. **Habitat**: Grassland, fallow paddy-fields, lateritic plateaus, thinly wooded wasteland etc. and wherever dragonflies, their staple food, are found. **Sites**: Terakol (Pernem); Anjuna, Baga area, Saligao plateau and paddy-fields, Sinquerim coast (Bardez); Chorao, Ciba-Geigy, Carambolim lake and grasslands, Dona Paula plateau (Tiswadi). **Distribution**: Not yet recorded in South Goa. **Observers**: Dennis (1999), Frost (pers. comm.), Holt (1997, 1998b, 1999), Jännes (1997, 1998), Lynes (1999), Robson (1999), van der Wielen (1998) and the author. **Population**: There are four records from 1997, six from 1998, five from 1999, two from 2000 and one from 2001. Singles were seen in 12 instances, pairs in five, and a threesome and a foursome in one instance each. **Seasonal status**: All records fall into the narrow time slot between 22nd October and 5th December. **Migration**: The Amur Falcon, like the until recently conspecific Red-footed Falcon *Falco vespertinus*, is an East-West traveler that migrates from its breeding grounds in Siberia, Amurland and Manchuria to its winter quarters in East and South Africa via north-east India and the South Konkan coast before crossing the Arabian Sea and Indian Ocean. Butler (1881) reported 'a huge flock numbering some thousands passing Belgaum (*ca.* 140 kilometres east of the Goa coast) on 24th November' and Davidson (1898) 'immense scattered flocks in November-December in some years all along the coast near Karwar (*ca.* 14 kilometres south of Goa)'. This along with Jännes' observation

of 'a male flying out to sea from Fort Aguada on 15th November 1997' suggests that the staging area for the ocean crossing is Goa and the stretch of coast immediately north and south of it.

(209-11) **Peregrine Falcon *Falco peregrinus*** Tunstall

(Peregrine, Shaheen Falcon)

First reported by Grubh and Ali (1976) who noted the subspecies *F. p. peregrinator* at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: An uncommon but widespread winter visitor to all regions, from offshore islands and the seashore to the base of the Western Ghats; rare in the midland region, most common in the coastal belt and river basins. **Habitat**: Occurs in a wide range of biotopes but clearly favours wetlands and their vicinity. **Favourite sites**: Up to three birds are reliably present on the pylons of the high-tension lines spanning the Cumbarjua canal. Other favoured sites are the Baga (18 sightings) and Carambolim area (11) and the Chapora estuary (7). This high number of sightings certainly reflects only the high frequency with which these popular birdwatching sites are visited. **Unusual sites**: An immature bird was seen on Navy Island off Bogmalo, on 26th October 1986. One specimen was observed going after feral pigeons between large 5-storeyed buildings in the heart of Panaji, on 6th February 1989. Two sightings each are from the Mollem/Collem area and the Cotigao WS. **Population**: The vast majority of sightings is of singles. Twos and threes are regularly seen perched on the pylons at the Cumbarjua canal and four birds were observed circling over Collem at dusk, on 24th November 1988. **Seasonal status**: The Peregrine Falcon is present in Goa from September (earliest record: 12th) to April (latest record: 18th). There is an unseasonal monsoon sighting of a single adult bird on 13th August 2002, at Cabo de Rama. **Remarks**: Birds of the nominate race *F. p.* peregrinator appear to make up about two thirds of the population while the remaining third is almost certainly of the subspecies *F. p. japonensis*.

PODICIPEDIDAE
Grebes

(5) **Little Grebe *Tachybaptus ruficollis*** (Pallas)

First recorded at the Velsao tank on 9th December 1981. **Status**: A common and widespread breeding resident of the coastal belt and the western rim of the midland region, up to 12 kilometres inland. **Habitat**: Small and medium-sized irrigation tanks and freshwater ponds with floating vegetation. Once recorded in the fully saline estuary of the Terakol river (20th November 1986). **Favourite sites and population**: Pilar pond (up to 45+ birds), Carambolim lake (up to 25+) and Curtorim tanks (up to 8+). **Seasonal status**: Recorded throughout the year. The high numbers

Little Grebe

recorded at Pilar and Carambolim in May and June do not signify an increase in the overall population but merely that Little Grebes tend to congregate there when other wetlands have gone dry. The sighting of a single bird traveling north *ca.* 200 metres off the Anjuna coast, on 4th July 1999, might indicate a (presumably local) migratory movement. **Breeding status**: The breeding season is ill-defined and protracted but mainly centered in the second half of the year. July is the only month in which neither incubation nor downy chicks nor fledglings were noted. Breeding was recorded at the following tanks and ponds: Carambolim, Batim, Pilar, Curtorim and Orlim.

SULIDAE
Boobies

(23) **Masked Booby** ***Sula dactylatra*** Lesson

Status: Vagrant. **Sightings**: An adult bird was seen flying north, 300-400 metres off the Anjuna coast, on 4th August 1997 (Lainer 1999a). Lynes (1999) observed an adult off Dona Paula, on 8th November 1997. **Miscellaneous**: There is a historical record by Davidson (1896) who 'obtained' a storm-blown specimen on 23rd June 1895 at Sadashivgadh (Uttar Kanara, Karnataka), a coastal village bordering directly on Goa.

(25) **Brown Booby** ***Sula leucogaster*** (Boddaert)

Status: Vagrant. **Sighting**: On 2nd June 1997, a few days before the break of the southwest monsoon, an adult bird settled for over 30 minutes on the waters just beyond the surf-line at Anjuna Beach, before continuing its northward flight. It was possibly a storm blown specimen, as the previous day a cyclonic depression had crossed over the northern Arabian Sea into Saurashtra. This is apparently only the second record from the Indian West Coast (Lainer 1999a).

ANHINGIDAE
Anhingas

(29) **Darter** ***Anhinga melanogaster*** Pennant

First reported by Willoughby (1996), who observed a breeding pair at Ciba-Geigy, in November 1994. **Status**: A very local breeding resident that is encountered in the coastal belt and river basins. **Habitat**: Freshwater tanks and ponds and, occasionally, saline or brackish water bodies. **Distribution**: Restricted to wetlands of Tiswadi taluka; rarely seen elsewhere (There are single records from the Baga saltpans, the Maem Todi tank at Curtorim and of a bird flying over the forests of the Cotigao WS – presumably commuting between wetlands. **Breeding status**: The Darter is a regular breeder, in steadily increasing numbers, in the heronry at the Ciba-Geigy ponds. Two occupied nests were counted in 1996, six in 1998, twelve in 2000 and thirteen in 2001. The raising of two consequent broods in a breeding season appears to be the norm. Incubation begins in late June (earliest record: 22nd) and ends in late October (latest record: 3rd November). Ali and Ripley (1983) give the breeding season for North India and Pakistan as June/July to December and for South India as November to February. Goa's breeding population, surprisingly, adheres to the North Indian timetable! **Seasonal status**: Recorded in all months but February and April. The first adult birds and prospective breeders arrive between mid-May and

the first days of June at the heronry; departure is usually complete by mid-January. The three sightings in March could have been of birds on passage.

PHALACROCOROCIDAE
Cormorants

(28) **Little Cormorant *Phalacrocorax niger*** (Vieillot)

First recorded at the Velsao tank on 23rd November 1982. **Status**: An increasingly common and widespread breeding resident, mainly of the coastal belt. Uncommon in the midland region and at the foot and crest of the Western Ghats. Totally absent only from the seashore and the slope of the Ghats. **Habitat**: The full range of saline, brackish and freshwater wetlands. **Population**: During the early and mid-eighties, sightings were few and group sizes always in single digits. The creation of two ponds in the factory compound of Ciba-Geigy Ltd. sometime in the late eighties and the subsequent establishment of a breeding colony brought a sudden increase of the statewide population to its present level of 800+ individuals. **Breeding status**: Regular breeder in the heronry at Ciba-Geigy in slightly fluctuating numbers. The number of occupied nests was 200+ in 1996, 225+ in 1997, 150+ in 1998, 142+ in 1999, 160+ in 2000 and 200+ in 2002. Nest building starts between 7th and 10th June and incubation around 20th June. The first half-grown chicks are usually seen during the first week of August. By mid-October the nests are deserted and disappear within a few days without leaving a trace. As with the Darter *Anhinga melanogaster,* the breeding season of the Little Cormorant in Goa rather coincides with the one given by Ali and Ripley (1983) for northern India and Pakistan. **Seasonal status**: After the breeding season the birds disperse all over the state (and, probably, further). No large-scale migratory movement is discernible.

(27) **Indian Cormorant *Phalacrocorax fuscicollis*** Stephens
(Indian Shag)

First reported by Willoughby (1993), who observed a single bird at the Carambolim lake on 10th March 1993. **Status**: Fairly common but not widespread and increasingly numerous resident in the coastal belt and local breeder at a single site. **Habitat**: As for Little Cormorant. **Sites and population**: During the breeding season fairly large numbers congregate in the heronry at the ponds in the Ciba-Geigy factory compound: up to 150+ in 1997, up to 200+ in 1998, up to 275+ in 1999 and up to 300+ in 2001. Carambolim lake (up to 6), Neura wetlands (up to 50+), Santa Cruz creek (up to 7+), ZAC reservoir (up to 5+) and Curtorim tanks (up to 8). Singles or twos were seen at the Baga creek, Sinquerim marsh, Pilerne pond, Divar, Talaulim wetlands, Pilar pond and Velsao-Pale tank. **Breeding status**: The first prospective breeders collect at the Ciba-Geigy heronry during the second half of May (earliest:

13th); incubation starts around the end of July (earliest: 14th); the first nestlings are seen at the beginning of September (earliest: 20th August). With the regular raising of two broods the breeding season stretches into January-February (the latest incubating birds were noted on 11th January) and the last birds leave the disintegrating heronry around the beginning of March (latest: 8th). The breeding population, after some fluctuation in 1997 and 1998, is levelling out in recent years: 40+ occupied nests were counted in 1997, 20+ in 1998, 102+ in 1999, 98+ in 2000 and 100+ in 2001. Ali and Ripley (1983) state that the breeding season in South India extends from November to February and in North India from August to October. The Indian Cormorants breeding in Goa appear to have amalgamated these two distinct breeding seasons by rearing two consecutive broods and thereby 'straddling' this North-South divide. **Seasonal status**: After the breeding season the birds disperse, presumably beyond Goa's borders since very few records exist for the dry season months of April and May.

Great Cormorant

(26) **Great Cormorant *Phalacrocorax carbo*** (Linn.)

(Large Cormorant, Cormorant)

First recorded by Holt (1997), Jännes and Kazmierczak, who observed a first year specimen at the Ciba-Geigy ponds, on 17th November 1997. **Status**: An occasional visitor, mainly during the southwest monsoon, to the basin of the Mandovi river. **Habitat**: Presumably as Little and Indian Cormorant's. **Sites and sightings**: Ciba-

Geigy (11 sightings), Carambolim lake and Santa Cruz creek (one sighting each). **Observers**: Frost (pers. comm.), Holt (1997, 1998b), Jännes (*fide* Holt 1997), Kazmierczak (*fide* Holt 1997), Smithson 1996 and the author. **Population**: Seven sightings were of single birds, four sightings of two and one sighting of three birds. **Breeding status**: An adult bird of the subspecies *P. c. sinensis*, in full breeding plumage, was present at the Ciba-Geigy heronry from 15th August to at least 9th September 2000. It showed every sign of breeding behaviour, like building a rudimentary nest and sitting on it in mock-incubation, but lacked a mate. **Seasonal status**: Recorded in January (one record), June (2), July (1), August (2), September (2), November (3) and December (2).

ARDEIDAE
Herons and Bitterns

(49) **Little Egret *Egretta garzetta*** (Linn.)

First recorded on 14th December at Kalay. **Status**: A very common and widespread dry season visitor and scarce non-breeding resident from just behind the seashore to the foot and crest of the Western Ghats; less common inland than in the coastal region. **Habitat**: Encountered in a very wide variety of wetlands, like margins of ponds and tanks, flooded paddy-fields, swampy grassland, fallow fields, rivers and streams in moist deciduous forest, freshwater as well as saline marshes, saltpans, prawn farms, tidal mudflats in estuaries etc. **Population**: Day counts of up to 100 birds are not unusual. The highest counts for single wetlands were 500+ birds at the Carambolim lake on 5th May 1999, 300 birds at Carambolim on 10th March 1993 (Willoughby 1993) and 250 birds at the Chorao prawn farm on 12th January 1999 (Lassey 1999). **Seasonal status**: Recorded throughout the year. Most of the dry season visitors leave in June, around the time the monsoon rains start. While July still sees groups of up 40 birds, only singles are observed in August and in many years even these are absent. In the second half of September the return movement starts as a trickle that becomes a steady stream in October. **Migration**: Southward offshore migration of 43+ birds several hundred metres off the Anjuna coast was observed on 7th October 1998.

(50) **Western Reef Egret *Egretta gularis*** (Bosc)
(Western Reef Heron)

First recorded on 5th November 1980 at Betim. **Status**: A fairly common dry season visitor to the coastal belt and river basins. **Habitat**: Strictly adheres to saline biotopes like rocky seashore and headlands, tidal mudflats in estuaries, banks on the lower reaches of rivers, creeks, mangrove swamps, saltpans, fish and prawn ponds. Only exceptionally found at freshwater bodies. **Favourite sites and popu-**

lation: Agassaim mudflats in the Zuari estuary (up to 139 birds), tidal mudflats between Divar and Chorao (up to 100+), Chapora estuary (up to 48), southern bank of the Mandovi between Panaji and Ribandar (up to 25+). **Unusual sites**: Mostly single birds were seen at the following freshwater sites: ZAC reservoir, Carambolim lake and flooded paddy-fields at Baga (up to 12 birds). **Seasonal status**: Pre-monsoon withdrawal lasts from mid-April until the first days of June (latest record: 4th June). The return movement begins in the last third of September (earliest record: 11th). There is not a single record from July and August. **Colour phases**: Most sightings are of dark morphs but this is most probably only a reflection of the fact that they are much more obvious than white ones, which are easily dismissed as Little Egrets. A closer look at larger and mixed congregations of Western Reef Egrets shows that actually the white morph is easily the dominant one, at least at certain times of the year. The break-up at the estuaries of the Zuari and the Chapora river in January 2001 is 124 white/15 dark and 35 white/13 dark morphs, giving an average of approx. 5:1. In April-May the ratio is even more in favour of white morph birds: 25:1, 15:1 and 24:2, resulting in an average of approx. 17 white/1 dark morph. **Remarks**: Although Dharmakumarsinhji and Lavkumar (1956) reported an enigmatic 'heronry of reef herons right in the center of the Oyster Rock off Karwar' just a dozen kilometers south of Goa, there is no indication of their breeding anywhere in Goa

Grey Heron

(35-6) **Grey Heron *Ardea cinerea*** Linn.

First recorded on 30th January 1995 when eight birds were seen at the Terakol estuary. **Status**: A fairly common dry season visitor and scarce non-breeding resident in the coastal belt and river basins. Exceptionally encountered at the base of the Western Ghats. **Habitat**: Found in a variety of freshwater, brackish and saline wetlands like margins of ponds and tanks, marshes, flooded paddy-fields, saltpans, tidal mudflats, mangrove swamps etc. **Favourite sites and population**: Ciba-Geigy ponds (up to 37+ birds), tidal mudflats between Chorao and Divar (up to 35+), Shiroda wetlands (up to 25+), Divar (up to 18), Chorao (up to 15+) and Neura wetlands (up to 15+). Such high numbers are exceptional and occur only in some years. Single figure day counts are the norm. **Unusual sites**: A single bird was seen in November 1988 in the paddy-fields of Collem that were flooded for the winter *vaingonn* crop. **Seasonal status**: The dry season visitors disappear with the onset of the southwest monsoon, usually in the first half of June, and return at the end of September or beginning of October. In most years, a handful or less birds stay on through the rains of July and August, usually at the fringes of the heronry at Ciba-Geigy. **Migration**: Groups of up to 6 birds were observed in some years moving south over the open sea, from 300 metres to one kilometre off the coast, in late September and early October.

(37-7a) **Purple Heron *Ardea purpurea*** Linn.

First recorded on 2nd March 1983 at Terakol. **Status**: A fairly common but thinly spread breeding resident of the coastal belt and the river basins. **Habitat**: In comparison with the previous species, the Purple Heron generally prefers wetlands with more cover. **Sites and population**: Favoured sites are Carambolim lake with up to 15+ birds and Neura wetlands with up to 11+. Single-digit numbers were observed at the Terakol estuary, Baga creek area, Candolim, Banastarim wetlands, Cumbarjua canal, Pilar and Merces ponds, Divar, Chorao, Santa Cruz, Shiroda wetlands, Curtorim and Macasana tanks, Velim tank. During the southwest monsoon birds congregate at the Ciba-Geigy heronry where up to 46 adults were counted in June 2001. **Breeding status**: The Purple Heron is a regular breeder at a single site, the heronry beside the two ponds in the Ciba-Geigy factory compound. The number of occupied nests was 18 in 1996, 18 in 1997, 35 in 1998, 22 in 2000 and 44 in 2001. Nest-building usually starts in the last days of April; the first downy chicks are seen at the end of May or beginning of June. From mid-July onwards, birds sit on their second clutch and breeding activity ends with the last youngsters flying the nest around mid-November.

(45-6) **Great Egret *Casmerodius albus*** (Linn.)

(Great White Egret, Large Egret, *Egretta alba, Ardea alba*)

First recorded on 14th April 1984 at the Parxem-Agarwaddo marshes. **Status**: A fairly common and widespread resident of wetlands in the coastal zone and breeder at a single locality. **Habitat**: More or less the same as Little Egret's. **Population**: The Asian Waterfowl Census (AWC), conducted in mid-January at all major wetlands of coastal North and South Goa, showed for the year 1999 a population of 109 birds, for 2001 of 108 and for 2002 of 164. **Breeding status**: The Great Egret breeds regularly in the heronry at the two ponds in the Ciba-Geigy factory compound at the end of the 'hot season' and during the southwest monsoon. The breeding population of adult birds in June-July, at the Ciba-Geigy heronry, was 70+ in 1997, 181+ in 2000, 132+ in 2001 and 165+ in 2002. Incubation starts in the last days of April and the first downy chicks are seen variously between the end of May and the last week of June (earliest: 29th April!!). Two broods are regularly raised until the heronry wears a deserted look towards the end of September. The number of occupied nests is rising steadily: 20+ in 1997, 32+ in 1998, 20+ in 1999, 77+ in 2000 and 92+ in 2001. **Seasonal status**: No marked seasonal fluctuations are discernible.

(47-8) **Intermediate Egret *Mesophoyx intermedia*** (Wagler)

(Smaller Egret, Median Egret, *Egretta intermedia*)

First recorded in the Baga creek area, on 27th June 1984. **Status**: A common dry season visitor to wetlands of the coastal belt and river basins; very rare at the foot of the Western Ghats. **Habitat**: Essentially the same as Great and Little Egret's. **Favourite sites**: Neura wetlands (up to 500+ birds on 29th May 1998); Carambolim lake (up to 395+ in April); Pilar pond (up to 200+ in May) and Velim tank (up to 60+ in January). **Seasonal status**: Day counts during the winter months are typically of up to 50 individuals. In April-May, as the dry season increasingly affects wetlands, egrets assemble at the last puddles of the Carambolim lake and the saline Neura marshes where congregations of several hundred birds are no rarity. The population drops sharply towards the end of May and only a handful of birds stay on occasionally during the rains in June, July and August. Autumn influx begins usually during the first September week.

(44) **Cattle Egret *Bubulcus ibis*** (Linn.)

(*Ardeola ibis, Egretta ibis, Ardea ibis*)

First reported by Grubh and Ali (1976), who noted it during their survey of 27th November to 12th December 1972 at Valpoi. **Status**: An abundant and widespread dry season visitor that is found from the coast to the base of the Western Ghats but is most common in the coastal belt and river basins. **Habitat**: Pastureland, damp grassland, paddy-fields (even if situated like 'islands' in evergreen forest), ponds, tanks

and pools; also dry stubble fields and wasteland. Once seen attending to cattle in a rubber plantation in the Cotigao WS. **Population**: During the autumn and winter months, day counts are usually of less than 50 birds (maximum number at the Carambolim lake: 311 birds in January). With the gradual drying up of wetlands during the hot season Cattle Egrets tend to congregate at the Carambolim lake where the population in April-May can be as high as 2000+ birds. **Seasonal status**: Cattle Egrets avoid the southwest monsoon by departing during May and the first week of June (latest: 25th) and are absent in July-August except for occasional cases of single birds staying on throughout the rains. They return towards mid-September when the rains have slackened or ceased altogether.

(42-2a) **Indian Pond Heron** ***Ardeola grayii*** (Sykes)

(Pond Heron, Paddybird)

First reported by Saha and Dasgupta (1992), who ascribed to the nominate race a specimen collected near Margao, on 17th December 1968, by one of the teams working for the Zoological Survey of India. **Status**: This seemingly ubiquitous species is an abundant dry season visitor and fairly common throughout-the-year resident that is encountered from offshore islets and the seashore to the base, rarely on the slope but commonly on the crest of the Western Ghats. **Habitat**: A very wide variety of freshwater, brackish and saline wetlands; exceptionally found at streams in dense evergreen forest. **Unusual sites**: Navy Island (numerous on rocky shore); single birds at a tiny stream between Sonaulim and Dudhsagar railway station (at an altitude of *ca.* 200 metres), below the Dudhsagar railway bridge (*ca.* 230 metres) and at a stream on top of Dudhsagar waterfalls (*ca.* 550 metres). **Population**: During the annual Asian Waterfowl Count (AWC), in mid-January, the population at the Carambolim lake was 650+ birds in 1999, 275+ in 2001 and 200+ in 2002. These counts covered probably less than 5% of the total number of Indian Pond Herons present in Goa. In April-May, when other wetlands go dry and birds congregate at the puddle that is left of the Carambolim lake, typical counts are 3-500 birds; the highest was 1000+ on 5th May 1999. **Breeding status**: The paddybird is said to breed traditionally during the southwest monsoon together with Cattle Egrets in a small heronry at a swamp on the outskirts of Mapusa-Corlim (Fresh Parab, pers. comm.). The only clear-cut instances of breeding are the record of three not yet fully-fledged youngsters at the Baga creek, on 17th September 1997, and the record of an incubating bird at the fringe of the Ciba-Geigy heronry, on 2nd September 2001.

(38-41) **Little Heron** ***Butorides striatus*** (Linn.)

(Striated Heron, Little Green Heron, *Ardeola striatus*)

First recorded on 7th June 1981 at a pond in Calangute. **Status**: A common breeding resident that is found from offshore islets and the seashore through the midland region to the base of the Western Ghats and on their crest. **Habitat**: Catholic in its

tastes – as long as it's water. The preferred biotope is mangrove-lined tidal rivers and creeks and mangrove swamps. Also encountered on rocky seashore where the Little Heron forages even on rocks in the surf-zone; margins of saltpans, fish and shrimp ponds and saline lagoons; freshwater pools, ponds and tanks; flooded paddy-fields; shady rivers and rock-strewn streams in the midland region and in even dense wet evergreen forest of the Western Ghats. **Population**: Along a *ca.* 5 kilometres stretch of the Cumbarjua canal, over 30 birds were counted. Visiting birders have seen 20+ birds at the Carambolim lake and 20 along the Baga creek. **Seasonal status**: Observed throughout the year with constant frequency and in unvarying numbers. **Breeding status**: Fledglings were seen in the first week of June, at the Baga creek.

(52) **Black-crowned Night Heron** ***Nycticorax nycticorax*** (Linn.)

(Night Heron)

First reported by Hume (1876), who noted 'a colony of night herons' on St. George's Island, off Bogmalo, when he passed there in February 1875 on his way to the Laccadive (now: Lakshadweep) Islands. **Status**: Uncommon but widespread visitor almost throughout the year, at wetlands of the coastal belt and river basins. **Habitat**: Preferred daytime roosts are mangroves lining saline and brackish rivers, creeks and marshes as well as massive trees near tanks and ponds. Nocturnal feeding was observed mostly in paddy-fields with standing crop and margins of freshwater ponds. **Favoured sites and sightings**: Baga area (29 sightings of up to 20+ birds), Ciba-Geigy (12 of up to 14 birds), Cumbarjua canal (7 of up to 29+ birds), Carambolim (4 of up to 15 birds), Sinquerim/Aguada marsh (3 of up to 3+ birds). **Other sites**: Night Herons are frequently seen commuting at dusk between their day-roosts and their nocturnal feeding grounds. Up to 7+ of these roving birds were seen on a dozen occasions over Anjuna. **Population**: The highest numbers observed were 29+ birds (all but two adults) at the Cumbarjua canal, on 14th March 2000. At the upper Baga creek, 20 adult and juvenile birds were seen on 7th November 2000 and at their roost tree next to Carambolim lake 15 birds were counted on 19th March 1993. **Seasonal status** (Frost's and author's data only): Recorded in all months except June and July. The first birds arrive in August (earliest: 13th) when the southwest monsoon is still active. Sightings peak in November (10 sightings), slow down over the winter (11 in three months) and reach another high in March (6) before petering out in April and May (one each). The latest specimen was seen on 1st May.

(53-54) **Malayan Night Heron** ***Gorsachius melanolophus*** (Raffles)

(Malay Bittern, Tiger Bittern)

Status: This extremely wary bittern is a very rare monsoon and premonsoon visitor at the base of the Western Ghats. **Habitat**: Tall but not too dense wet evergreen forest. **Sites and sightings**: On 9th July 1985, a single specimen was seen in forest

along the 'ring road' in the Bhagwan Mahavir WS (Lainer 1999a). One more single bird was observed by the author in forest beside the artificial waterhole at the 'watchtower' site in the Cotigao WS, on 18th May 2001. **Remarks**: Davidson (1898) reported to 'have seen the bird at ... Anshi ..., all in May, and at many places round Karwar in the rains.' Both sites are in North Kanara (Karnataka) and only a dozen or so kilometers south of Goa.

(57) **Yellow Bittern** ***Ixobrychus sinensis*** (Gmelin)

(Chinese Little Bittern)

First reported by the author (1999a), who observed a single at a marsh at Arpora-Baga, on 20th December 1995. **Status**: Scarce dry season breeding visitor at wetlands of the coastal belt and river basins. **Habitat**: The preferred biotope appears to be patches of sea holly in saline or brackish wetlands, mangroves lining the banks of creeks. Only rarely seen at freshwater ponds, tanks and paddy-fields. Exceptionally found on pastureland. **Favourite sites and sightings**: Baga creek, marsh and paddy-fields (17 sightings of singles and twos), Ciba-Geigy ponds (2), Cumbarjua canal (2) and Mayem lake (2). **Unusual sites** (single sightings): Parxem-Agarwaddo marshes, Candolim marsh, Carambolim. **Observers**: Duffield (2000), Frost (pers. comm.), Griggs (1996), Holt (1996b, 1997, 1998b, 1999), Jännes (1998) Lassey (2000), Prasad (1996), Ransdale (1998), van der Wielen (1998) Willoughby (1997) and the author. **Seasonal status**: Recorded from January through May and October through December. Absent during the Southwest monsoon. **Breeding status**: Two not yet fully-fledged juveniles were observed at the Baga creek on 27th November 1998. Juvenile and immature birds were recorded in February (Duffield 2000), March, May and October.

(56) **Cinnamon Bittern** ***Ixobrychus cinnamomeus*** (Gmelin)

(Chestnut Bittern)

First recorded on 25th March 1981 at Anjuna. **Status**: A fairly common and widespread monsoon visitor, rare during the dry season except in paddy-fields that are irrigated for the *vaingonn* winter crop and a couple of freshwater marshes near such fields. Encountered from immediately behind the beaches to the foot of the Western Ghats and on their crest. **Habitat**: The Cinnamon Bittern is essentially a bird of standing paddy, be it in the lowlands or in the 'islands' of rice cultivation in valleys that wind through the hills of the midland region and in the forests at the base of the Ghats. It is also found at freshwater sites such as pond and tank margins, damp grassland and occasionally even at saltpans, patches of sea holly and reedbeds lining saline creeks. **Seasonal status**: Recorded (by Frost and the author) in all months except April for which month, however, records by visiting birdwatchers exist. Depending on the start of the southwest monsoon, the Cinnamon Bittern arrives between 15th and 25th June. Sightings reach a peak in July and August when these

otherwise crepuscular birds are active throughout the day. September, October and November see a slackening of this activity until it peters out in the winter months, the birds inhabiting the *vaingonn* winter crop being much less demonstrative. **Breeding status**: The behaviour of birds during the southwest monsoon suggests that the majority breeds during July-August, but proof is still absent. Juveniles were observed in November. **Remarks**: Holt (*in litt.* 2000) sums up the perceptions of visiting 'birders' as follows: 'There are actually a good number of dry season reports – in the four years from 1996 to 1999 I personally saw the species on 78 dates between the 30th October and 14th February. The majority of (dry season) visiting observers see the species in the small marsh immediately behind the Beira Mar hotel, Baga where, from at least end of October to mid-February, one, occasionally two and once, 2nd November 1998, three birds are seen most evenings. Not usually observed before 17:30 [hrs], birds are only occasionally seen in the early mornings. The only other site that the species is regularly encountered during the dry season is Carambolim lake. I've seen between one and three birds here on six dates though elsewhere have only noted singles at Candolim marsh (once), the Carambolim grassland site (twice) and the Santa Cruz paddies (once).'

PHOENICOPTERIDAE
Flamingos

(73) **Greater Flamingo *Phoenicopterus rubber*** Linn.
(Flamingo)

Status: Vagrant. **Sighting**: An adult bird in prime condition was seen by Frost and the author in a saline lagoon at Divar-Navelim, in the inland estuary of the Mandovi, on 3rd November 2000.

THRESKIORNITHIDAE
Ibises and Spoonbills

(71) **Glossy Ibis *Plegadis falcinellus*** (Linn.)

First recorded on 9th November 1988 when two birds were observed in the Agarwaddo marshes. **Status**: An uncommon dry season and rare monsoon visitor at wetlands of the coastal belt and river basins. This ibis is somewhat erratic in its appearances and much on the move between wetlands. **Habitat**: Saline and brackish lagoons and marshes, though freshwater sites like ponds, tanks, marshes and flooded paddy-fields are preferred. **Favoured sites and sightings**: Carambolim lake and wetlands (41 sightings of up to 120 birds), Ciba-Geigy ponds (21 of single birds), Neura wetlands (7 of up to 60+ birds), Agarwaddo marshes (3 of up to 20

birds). **Unusual sites** (single sightings): Chapora estuary, Gudem marsh, Chorao, Divar-Navelim, near Santa Cruz, Macasana paddy-fields. **Observers**: Arnold (1997), Beevers (1999), Burfield (1998), Carthy (1998), van der Dol (1999, 2000), Frost (pers. comm.), Hill (1997), Holt (1997, 1998a, 1998b, 1999), Jännes (1997), Lassey (1999), Lynes (1999), Marsh (1998), Ransdale (1998), Rodgers (1997), Smithson (1996), van der Wielen (1998) and the author. **Population**: The highest numbers, 120 birds at Carambolim on 8th February and 100 birds at Chorao on 9th February 1999, were counted by van der Dol (1999). **Seasonal status**: Recorded throughout the year. Sightings peak slightly in September-October, indicating a not very pronounced autumn inward migration, and flatten out until a high peak in April-May when numbers are apparently augmented by passage migrants. Sightings during the monsoon months of June, July and August are very rare.

(69) **Black-headed Ibis** ***Threskiornis melanocephalus*** (Latham)

(Oriental White Ibis, White Ibis, *T. aethiopica*)

First recorded when a single was seen flying across the Chapora estuary, on 6th April 1981. **Status**: An occasional dry season visitor to wetlands in the coastal belt and river basins of mainly North Goa. **Habitat**: Freshwater biotopes like ponds and tanks are preferred but saline and brackish lagoons and marshes are frequented as well. **Favoured sites and sightings**: Ciba-Geigy ponds (56 sightings of up to 89 birds), Carambolim lake and paddy-fields (15 of up to 29 birds), Shiroda marshes (9 of up to 15 birds), Divar (5) and Chorao (4). **Unusual sites** (one and two sightings): Chapora estuary, Cumbarjua canal, Neura wetlands, Curtorim paddy-fields and Sal river estuary. **Observers**: Addey (1995), Anon (1998a), Arnold (1997), Burfield (1998), Carthy (1998), Djerf (1997), van der Dol (1999), Frost (pers. comm.), Gibson (1998), Gilmore (1997), Hill (1998a), Holt (1997, 1998a), Lynes (1999), Marsh (1998), Sutton (1997), Sykes (1999) Tunturi (1997), Willoughby (1997) and the author. **Population**: The highest numbers, 89 birds on 26th May and 54 birds on 1st May 2002, were observed at the Ciba-Geigy ponds by Frost and the author. **Seasonal status**: Recorded in all months except July, August and October. Only a single record is known from September. By far the most sightings are from March, April and May, suggesting a spring migration that could be just a local movement from the drier Deccan Plateau to the wetter lowlands of Goa.

(72) **Eurasian Spoonbill** ***Platalea leucorodia*** Linn.

(White Spoonbill, Spoonbill, *P. regia*)

First reported by Addey (1995), who spotted an immature specimen at a marsh at Arpora-Baga, on 11th and 13th November 1995. **Status**: A scarce and incursive dry season visitor to the coastal belt and river basins. **Habitat**: Freshwater tanks and ponds and, to a lesser degree, a variety of saline and brackish water bodies. **Favoured sites and sightings**: Ciba-Geigy (30 sightings), Carambolim area (11), Neura wet-

lands (3), Arpora-Baga (3). **Unusual sites** (single sightings): Anjuna-Tembi, Chorao, Cumbarjua canal, Shiroda marshes. **Observers**: Addey (1995), Anon. (1998a), Crombet-Beolens (1997), Dennis (1999), van der Dol (1999), Frost (pers. comm), Gibson (1998), Hill (1998a), Holt (1998b, 1999), Spalding (1998), Sutton (1997), Whalin (1999), Willoughby (1997) and the author. **Population**: The highest number observed were 24 individuals at Ciba-Geigy, on 12th February 1997 (Willoughby 1997). Probably not more than 9 incursions occurred during the 7 years from 1995 to 2001. Mostly single-digit groups stayed for up to 79 days and an average of 47 days. **Seasonal status**: Not yet recorded from July through October. Monthly sightings (Frost's and author's data only): January – 4, February – 2, March – 7, April – 2, May – 2, June – 4, November – 1, December – 4.

CICONIIDAE
Storks

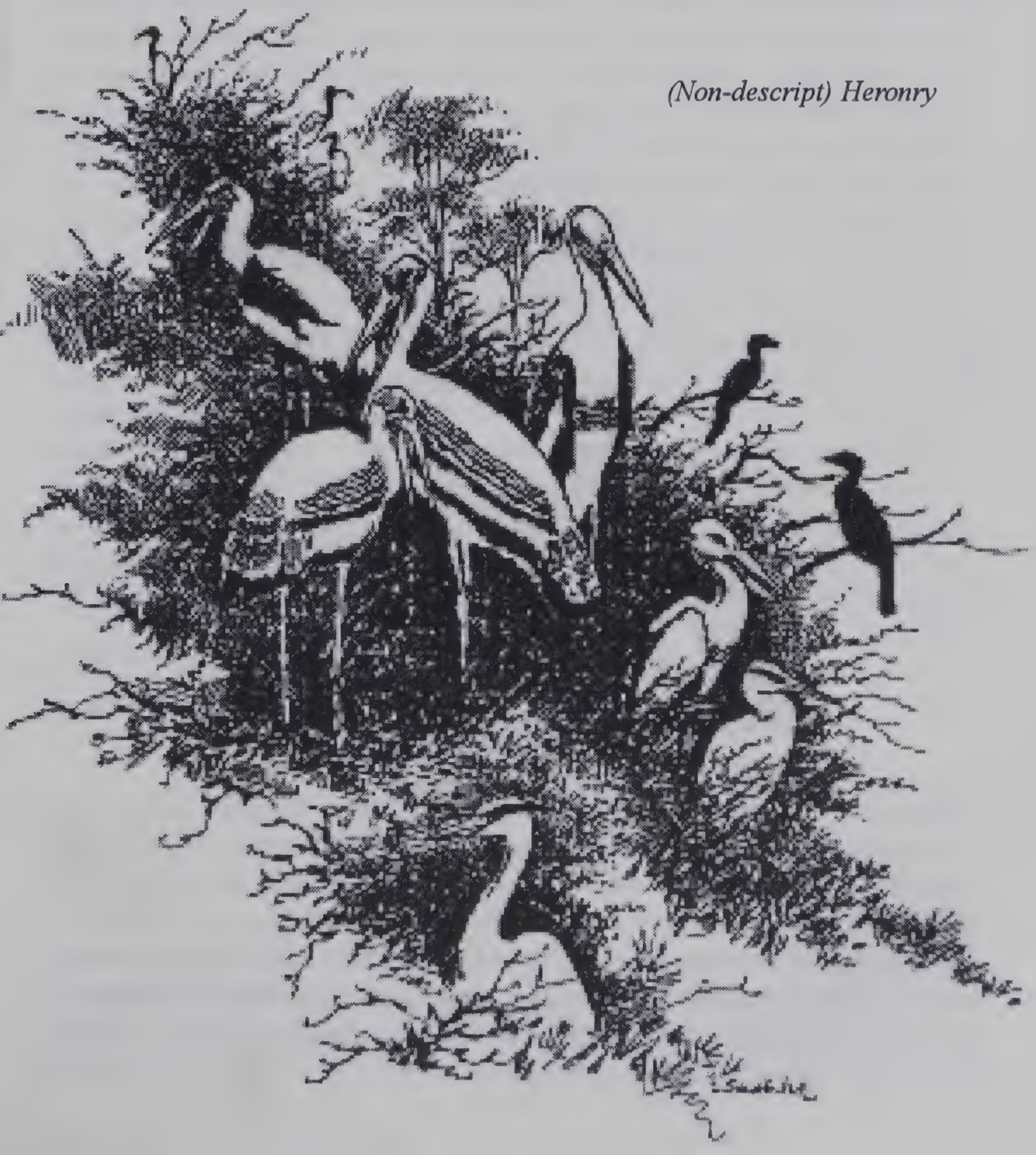
(60) **Painted Stork** *Mycteria leucocephala* (Pennant)

First reported by Hill (1995), who saw a single bird circling over fields at Arpora-Baga, on 27th January 1995 and 8 individuals on 30th January. **Status**: A casual winter and spring visitor at wetlands of the coastal belt. **Habitat**: This stork prefers fresh-water ponds and tanks but visits brackish and saline wetlands as well. **Sites and sightings**: Ciba-Geigy (21 sightings), Carambolim lake (4), Arpora fields (2), Salim Ali Bird Sanctuary (1), Shiroda marshes (1), Neura wetlands (1), Tivim-Damedem (1), Cotigao WS (1). **Observers**: Anon. (1998a, 1998b), Crombet-Beolens (1997), Frost (pers. comm.), Gibson (1998), Hill (1995), Holt (1998a), Luoto (1997), Marsh (1998), Welland (2000), van der Wielen (1998) and the author. **Population**: This relatively high number of records stems from the repeated sightings of groups of up to 8 birds that switch frequently between wetlands. Almost certainly, there were only six incursions of birds that stayed on for up to 93 days. **Seasonal status**: Recorded in January, February, March, May, November and December. Holt (1998a) offers the following explanation for the prolonged presence of up to 8 Painted Storks in 1998: 'Many places in northern and central India were already suffering from a shortage of water in February 1998 because of the previous summer's poor monsoon and several traditional nesting areas were deserted. Keoladeo Ghana National Park (Bharatpur, in Rajasthan) for example usually has about 700 birds nesting in January and February but was completely deserted in 1997-1998 dry season. Its not inconceivable that some of the Goan birds had moved quite considerable distances because of the drought'.

(61) **Asian Openbill** *Anastomus oscitans* (Boddaert)

(Asian Openbill Stork)

First recorded on 11th November 1984, when a single bird was sighted over saltpans at Arpora-Baga. **Status**: This stork is a locally fairly common winter and dry season visitor and scarce monsoon visitor at wetlands of the coastal belt. **Habitat**: Margins of ponds and tanks, saline as well as brackish and freshwater marshes, flooded paddy-fields that are plowed for the winter *vaingonn* crop, soggy stubble fields etc. **Sites**: Terakol estuary, Baga creek area, near Santa Cruz, Ciba-Geigy ponds***, Carambolim paddy-fields**, Curtorim-Maina paddy-fields, Shiroda marshes*. **Population and seasonal status**: Monthly maximum numbers (Frost's and author's data) decline from a January peak of 70+ individuals to 39 in April, 25 in June and three in July. Autumn influx begins in September with a maximum of five birds,



(Non-descript) Heronry

continues with 18 in October and reaches 66 in December. Not yet recorded in August. Numbers hardly fluctuate from year to year.

(65) **Black Stork *Ciconia nigra*** (Linn.)

Status: Very rare winter visitor. **Sightings**: Frost and the author (1999a) observed two specimens (an adult and an immature) at the ponds in the Ciba-Geigy factory compound, on 11th January 1998. These birds stayed on there until 18th January (Frost, pers. comm.). Two juvenile birds were seen circling high over the fields of Arpora-Baga on 13th November 1999, by Holt (1999).

(62) **Woolly-necked Stork *Ciconia episcopus*** (Boddaert)

(White-necked Stork)

First recorded on 17th March 1982 when three birds were seen in fields at Arpora-Baga. **Status**: An uncommon, locally fairly common dry season visitor of wetlands in the coastal region and river basins; occasional visitor to the base and crest of the Western Ghats. **Habitat**: Very much like Openbill Stork's. Additionally found at shady streams and rivers in even dense wet evergreen forest of the Ghats. Not infrequently seen soaring over the wooded hills of the Ghats. **Sites in the coastal belt**: Tivim-Damedem, Baga creek* (Bardez); Divar-Navelim, Carambolim lake and paddy-fields**, Ciba-Geigy***, Neura wetlands (Tiswadi), Shiroda marshes (Ponda), Velim tank (Salcete). The Ciba-Geigy compound, the most favoured single site, is primarily a night roost from which the birds disperse in the morning and return to in the evening. **Sites in the Western Ghats**: Top of Dudhsagar waterfalls (5 sightings), Caranzol (1), Devil's Canyon (2). **Population and seasonal status**: Monthly maximum numbers (Frost's and author's data only) climb from three in October to 27 in December, 40 in February and 62 in April. After a dip to 24 birds in May, a peak of 55 is reached in June at the Ciba-Geigy ponds when almost all other freshwater bodies have gone dry. This stork is absent during the monsoon months July, August and September. The earliest dry season visitor was seen on 11th October, the latest on 12th June.

(63-64) **White Stork *Ciconia ciconia*** (Linn.)

(European White Stork)

First reported by the author (1999a), who saw an adult specimen soaring above the Dudhsagar waterfalls, before it headed westward, on 5th February 1998. A couple of hours later, Frost (pers. comm.) discovered it at the ponds in the Ciba-Geigy compound where it was also seen by Holt (1998a) on 7th February. The bird remained until 17th February (Anon 1998a and Marsh 1998). **Status**: Very rare winter visitor. **Habitat**: Brackish and freshwater marshes and ponds. **Other sightings**: At the Shiroda marshes, Frost and the author observed four adult birds on 13th and three on 28th December 2000.

(68) **Lesser Adjutant** ***Leptoptilos javanicus*** (Horsfield)

(Lesser Adjutant Stork)

First recorded on 19th August 1988, when a single bird was seen soaring over the Tourist Complex at Mollem, in the Bhagwan Mahavir WS. **Status**: Uncommon but regular dry season and rare monsoon visitor at a few wetlands in the inland estuary of the Mandovi, North Goa. **Habitat**: Very much like Openbill Stork's. **Favoured sites and sightings**: Ciba-Geigy (71 sightings), Divar island (7), Carambolim lake and area (4). **Unusual sites** (single sightings): Mollem, Cumbarjua canal, Tivim-Damedem. **Population and seasonal status**: The annual maximum numbers counted by Frost and the author were 18+ birds in 1990, 10 in 1996, 7 in 1997, 17 in 1998, 10 in 1999, 13 in 2000, 10 in 2001 and 17 in 2002, showing a fairly steady population with only slight fluctuations from year to year. Monthly maximum numbers fluctuate between 11 and 18 birds, except in June, July, September and October, which show single-digit figures.

FREGATIDAE

Frigatebirds

(31) **Great Frigatebird** ***Fregata minor*** (Gmelin)

(Lesser Frigatebird, Greater Frigatebird)

Status: Stray. **Sighting**: A female specimen was observed by the author (1999a) as it swooped low over a cliff at Anjuna before disappearing over the sea, on 16th September 1990.

(32) **Lesser Frigatebird** ***Fregata ariel*** (G. R. Gray)

(Least Frigatebird, Small Frigatebird)

Status: Stray. **Sighting**: In the morning of 18th September 1998, a single bird was seen twice *ca.* 1-1.5 kilometres off the Anjuna coast, during one of the author's (1999a) autumnal seabird watches.

PROCELLARIIDAE

Petrels, Shearwaters and Storm-Petrels

(13a) **Jouanin's Petrel** ***Bulweria fallax*** Jouanin

(Jouanin's Gadfly Petrel)

Status: Apparently very rare, but possibly overlooked, autumn passage migrant. **Sighting**: On 23rd September, during one of his regular 'seabird watches', the author observed 342+ individuals within the span of 90 minutes travelling purposefully in a northerly direction, in an up to five kilometres wide swath, off the Anjuna coast.

(9) **Wedge-tailed Shearwater *Puffinus pacificus*** (Gmelin)

(*Procellaria pacifica*)

First recorded on 20th September 1998, when the author saw a single pale phase specimen passing southward, about a kilometer off the coast of Anjuna. **Status**: Probably a not so rare offshore migrant on autumn passage. **Other sightings**: Single birds were observed on 21st September and 5th October 1998 as well as on 12th July and 16th August 2001. Two of the shearwaters were in pale phase while one was in dark phase plumage. All specimens travelled in a southward direction, between 300 metres and a kilometer off the Anjuna coast.

(12) **Persian Shearwater *Puffinus persicus*** Hume

(Audubon's Shearwater, *P. lherminieri*)

First reported by the author (1999b), who spotted a single specimen sailing along the coast at Anjuna in a southerly direction, on 19th June 1984. **Status**: Stray or very rare passage migrant. **Other sighting**: One bird travelled southward, about 250 metres off the Anjuna coast, on 25th September 2001. **Remarks**: During both records, cyclonic conditions prevailed in the northern Arabian Sea.

(14) **Wilson's Storm-petrel *Oceanites oceanicus*** (Kuhl)

First recorded on 18th August 1988 when dozens of birds were seen off the Anjuna coast. **Status**: This pelagic species is encountered irregularly during southward offshore passage in autumn. **Habitat**: Inshore waters from about 300 metres to several kilometers off the coast. **Migration**: Capriciously fluctuating numbers were seen foraging along the coast, moving almost imperceptibly but steadily in a southerly direction, in August and September of 1988, 1989, 1996 and 1998. This migration starts in mid-August (earliest record: 11th) and peaks in the first week of September, when a 90° sweep with a fieldscope rarely reveals less than 20 birds. The last stragglers are seen in late September (latest record: 1st October).

PITTIDAE

Pittas

(867) **Indian Pitta *Pitta brachyura*** (Linn.)

First recorded on 21st June 1981 at the Nagoa valley. **Status**: This brilliantly coloured Indian subcontinent endemic is the darling of all visiting 'birders'. Yet, by visiting Goa only during the 'cool season' (mid-November to mid-March) and zeroing in on the few sites where this bird can then be seen, they cannot have an inkling of its true status. The Indian Pitta is primarily a widespread breeding visitor during the second half of the 'hot season' and the entire southwest monsoon. It is then fairly

common to locally common in the coastal belt, uncommon in the midlands and fairly common at the base and lower slopes (up to about 150 metres) of the Western Ghats and their outlying hills. Secondarily it is a scarce throughout-the-year resident that is distributed thinly and patchily from just behind the seashore to the foot of the Ghats. **Habitat**: Well-wooded villages, overgrown gardens, thickets of scrub, all sorts of woodlands with dense undergrowth, remnant semi-evergreen woods at the base and scarp of plateaus, broken and fringe semi-evergreen and, occasionally, evergreen forest. **Dry season sites**: Arambol (Pernem); Anjuna, Baga ridge, Arpora, Nagoa valley, Parra, Candolim, Sinquerim, Fort Aguada (Bardez); Mayem lake (Bicholim); Bondla WS (Ponda); Backwoods Camp, Tambdi Surla, Bhagwan Mahavir WS (Sanguem); Cotigao WS (Canacona). **Population**: Day counts during the 'hot season' and the rains vary between one and 20 birds. A mixed woodland of about 0.3 sq.km, like the Nagoa valley or Saligao spring, can then contain up to a dozen calling birds. During dry season, probably not more than 20-40 birds are present in the entire state. **Breeding status**: Nest building was noted in late May, feeding of nestlings in early July. **Seasonal status**: The large-scale influx of summer visitors starts variously between mid- and late April, usually between 18th and 28th, with many of the birds probably being passage migrants. The summering population stays at a fairly high level throughout June-July and melts away towards the end of August. The following table is a monthly split-up of all entries of the Indian Pitta in the author's diaries:

January	5	May	26	September	2
February	3	June	11	October	1
March	5	July	9	November	2
April	12	August	7	December	1

It should be kept in mind that during the period April-August only records of exceptionally high numbers or at unusual sites were noted down and that the author did not go out of his way to visit sites where the pitta is found during the dry season. **Vocalization**: Holt (*in litt.* 2000), writing for the benefit of visiting birdwatchers, remarks: "Most readily located by their voice (the 'song' is an often loud, sharply enunciated, two-note whistle that is usually delivered singly, and with the second note descending – *pree-treer*) Indian Pittas rarely call during the day but often do so in the early morning and at dusk hence its occasional nickname 'Six o'clock Bird.'" This scenario changes dramatically when the summering birds arrive. In late April and throughout May, apparently the month of courtship, the far-carrying and repeated calls are heard throughout the day and, at least in areas of a more varied landscape, like coastal Bardez *taluka*, from every hillside. The Indian Pitta's tendency to call in daytime diminishes in June-July and ceases altogether in August.

IRENIDAE
Fairy Bluebirds and Leafbirds

(1109-10) **Asian Fairy Bluebird** ***Irena puella*** (Latham)
(Fairy Bluebird)

First reported by Saha and Dasgupta (1992), who collected a female specimen of the nominate race *I. p. puella* around Valpoi, on 23rd December 1968. **Status**: A locally common resident of the Western Ghats and its outlying hills and hillocks, from the base to the crest. **Habitat**: Evergreen, semi-evergreen and moist deciduous forest, occasionally also in less dense, park like woodland and open forest. **Favourite sites**: Cotigao WS***, Bhagwan Mahaveer WS** and Bondla WS*. **Unusual sites**: At the Cabo de Rama headland, where a spur of the Western Ghats juts out into the Arabian Sea, and at the Shirotim valley, a few kilometers to the South of Cabo de Rama, smallish groups of the Asian Fairy Bluebird can be seen as close as 50 metres to the seashore. **Population**: Day counts can vary to a great degree – from a couple of individuals to several hundred. In July, at the peak of the southwest monsoon, this species is frequently the most numerous and dominant bird species in the forests of the Cotigao WS and Bhagwan Mahaveer WS. During the winter months and, especially, on cold days, flocks of well over 100 birds can be observed taking the early morning sun on the fringes of a forest glade between the Hedumol Checkpost and Tirval, in the Cotigao WS. **Breeding status**: Doubtlessly breeding in Goa, but direct proof is still absent. **Seasonal status**: Recorded throughout the year, most commonly during the winter months and the southwest monsoon. **Miscellaneous**: This usually highly gregarious bird, conspicuous when vocal and easily overlooked when silent, is frequently a member of mixed-species feeding groups.

(1107-8) **Blue-winged Leafbird** ***Chloropsis cochinchinensis*** (Gmelin)
(Gold-mantled Leafbird, Gold-mantled Chloropsis, Jerdon's Chloropsis)

First reported by Saha and Dasgupta (1992), who collected two male specimens of the subspecies *C. c. jerdoni* around Valpoi, on 11th and 15th January 1969, during one of their many collecting trips to Goa for the Zoological Survey of India. **Status**: A fairly common breeding resident of the base and lower slopes of the Western Ghats, the midland region, the eastern rim of the coastal strip and even close to the seashore where plateaus advance to the coast. **Habitat**: Mainly semi-evergreen forest, especially the remnant patches in valleys penetrating the scarp of plateaus facing the coastal strip; also in moist deciduous and secondary forest, groves, mango topes and large leafy trees on village outskirts etc. **Population**: Generally encountered solitary or in pairs but loose groups of over 10 birds in the same locality have been observed. **Breeding status**: Nest building was observed in late June and incubation in Septem-

ber, both at midland sites bordering the coastal belt. **Seasonal status**: Recorded throughout the year in unvarying numbers and with near-constant frequency. **Miscellaneous**: This bird is an occasional member of mixed-species feeding parties.

(1103-5) **Golden-fronted Leafbird** ***Chloropsis aurifrons*** (Temminck)

(Gold-fronted Chloropsis)

First reported by Saha and Dasgupta (1992), who collected a female specimen between Mollem and Collem, on 31st December 1969 and ascribed it to the subspecies *C. a. frontalis* based on range. **Status**: A fairly common, almost certainly breeding resident of all three zones, from immediately behind the seashore to the upper slopes (up to *ca.* 350 metres) of the Western Ghats. **Habitat**: A wide range of woodlands, from dense evergreen Ghat-forest to mango groves in seaside villages. **Sites**: Terakol (Pernem); Nagoa valley, Porvorim, Tivim-Damedem (Bardez); Mayem lake (Bicholim); near Valpoi (Sattari); Carambolim (Tiswadi); Bondla WS (Ponda); Velsao-Dorvoll (Marmagoa); Tambdi Surla, Kalay, Collem, Bhagwan Mahavir WS (Sanguem); Gaodongrem, Cotigao WS (Canacona). **Population**: Almost exclusively found singly or in pairs. **Breeding status**: Courtship display was observed in mid-January and juvenile birds in October, suggesting that annually two broods might be raised. **Seasonal status**: Encountered throughout the year with unchanging frequency and in near-constant numbers. **Miscellaneous**: This species and the Blue-winged Leafbird occur side by side in a wide variety of their woodland habitats though the latter appears to prefer less densely wooded localities. Frequently encountered in mixed-species feeding parties.

LANIIDAE
Shrikes

(943) **Rufous-tailed Shrike** ***Lanius isabellinus*** Hemprich & Ehrenberg

(Isabelline Shrike, Red-tailed Shrike, Pale Brown Shrike)

First reported by Holt (1996b), who observed a single bird near Santa Cruz on 19th December 1996. **Status**: A casual, possibly annual winter visitor to sites in the coastal belt. **Habitat**: Mostly encountered perched on power lines passing over wasteland and pastures near saline marshes and, exceptionally, on a lateritic plateau. **Sites and sightings**: Baga fields (four sightings), Santa Cruz creek area (4), Divar-Navelim (2), Chorao prawn farm (1) and Arpora-Parra hill (1). **Observers**: Duffield (2000), Frost (pers. comm.), Holt (1996b, 1997, 1998a, 1998b, 1999), Prasad (1999). **Population**: All records are of singles except one, which was of two birds. **Seasonal status**: The records span the period from 8th November to 10th February.

(949-50a) **Brown Shrike *Lanius cristatus*** Linn.

First recorded by Saha and Dasgupta (1992), who collected a female specimen of the nominate race *L. c. cristatus* near Margao, on 18th December 1968, for the Zoological Survey of India. **Status**: Uncommon but widespread winter visitor to all three regions, from just behind the beaches to the middle slopes (up to *ca.* 300 metres) of the Western Ghats; scarce in the midlands. **Habitat**: Occurs in an amazingly wide variety of biotopes, like coastal casuarina plantations, overgrown gardens, mango topes, groves of coconut palms, mangroves along creeks, fallow and flooded paddy-fields, bush-lined dykes in saline and freshwater wetlands and patches of remnant semi-evergreen forest in the coastal belt to forest fringes, dense scrub, pastures, edges of forest clearings, deciduous and not too dense evergreen forest in the Western Ghats. **Sites and sightings**: Terakol, Morjim beach (Pernem); Anjuna, Arpora, Baga creek, Tivim-Damedem, Candolim marsh, Pilerne pond (Bardez); Sattrem (Sattari); Chorao-Tikanem, Divar, Carambolim, Neura wetlands (Tiswadi); Bondla WS (Ponda); Velsao (Marmagoa); Tambdi Surla, Sonaulim, Collem, Mollem, Kalay, Bhagwan Mahaveer WS (Sanguem); Cabo de Rama (Quepem); Cotigao WS (Canacona). **Seasonal status**: Present between mid-October (earliest record: 1st) and early March (latest record: 7th).

(939-40) **Bay-backed Shrike *Lanius vittatus*** Valenciennes

First reported by Welland (2000), who, together with B. Moreford, observed a single bird in the Arpora-Baga area on 21st December 1995. **Status**: Uncertain. Probably a casual or scarce autumn passage visitor to the coastal belt and, in the Cotigao WS, the base of the Western Ghats. **Habitat**: Open tracts of land with a scattering of trees or bushes. **Sightings**: Welland (2000), together with N. Earnshaw, saw two individuals on 30th November 1996, again in the Baga area. Single birds were seen in the Carambolim area on 8th November 1997 (Senior 1997), in the Cotigao WS on 14th October and 19th November 1998 (Frost, author), at Arambol on 25th November 1998 (Holt 1998b) and the Baga fields on 29th November 1999 (Dennis 1999). **Seasonal status**: All seven records fall within the period from 14th October to 21st December.

(946-8) **Long-tailed Shrike *Lanius schach*** Linn.

(Rufous-backed Shrike, Black-headed Shrike)

First reported by Saha and Dasgupta (1992), who collected the first of 9 specimens in the Valpoi area, on 26th February 1969. They ascribed all of them to the subspecies *L. s. caniceps*. **Status**: A widespread dry season visitor to all three regions, from just behind the seashore to the lower slopes of the Western Ghats (up to *ca.* 200 metres), that is common in the coastal belt and river basins, uncommon in the midland region and Ghats. Occurs also on the crest of the Ghats. **Habitat**:

Encountered in a variety of predominantly open sites like grassland, paddy-fields, orchards and plantations, gardens (even in the center of towns, e.g. municipal garden of Panaji), scrub and open forest; also along tracks and on the fringes of clearings in all types of forest, even evergreen. **Population**: Almost invariably found singly. Day counts between three and 10 birds appear to be the norm. **Seasonal status**: Present from mid-September (earliest record: 9th) to mid-April (latest record: 27th).

CORVIDAE

CORVINAE

Jays, Magpies, Treepies, Choughs, Crows and Ravens

(1030a-4) **Rufous Treepie** ***Dendrocitta vagabunda*** (Latham)

(Indian Treepie)

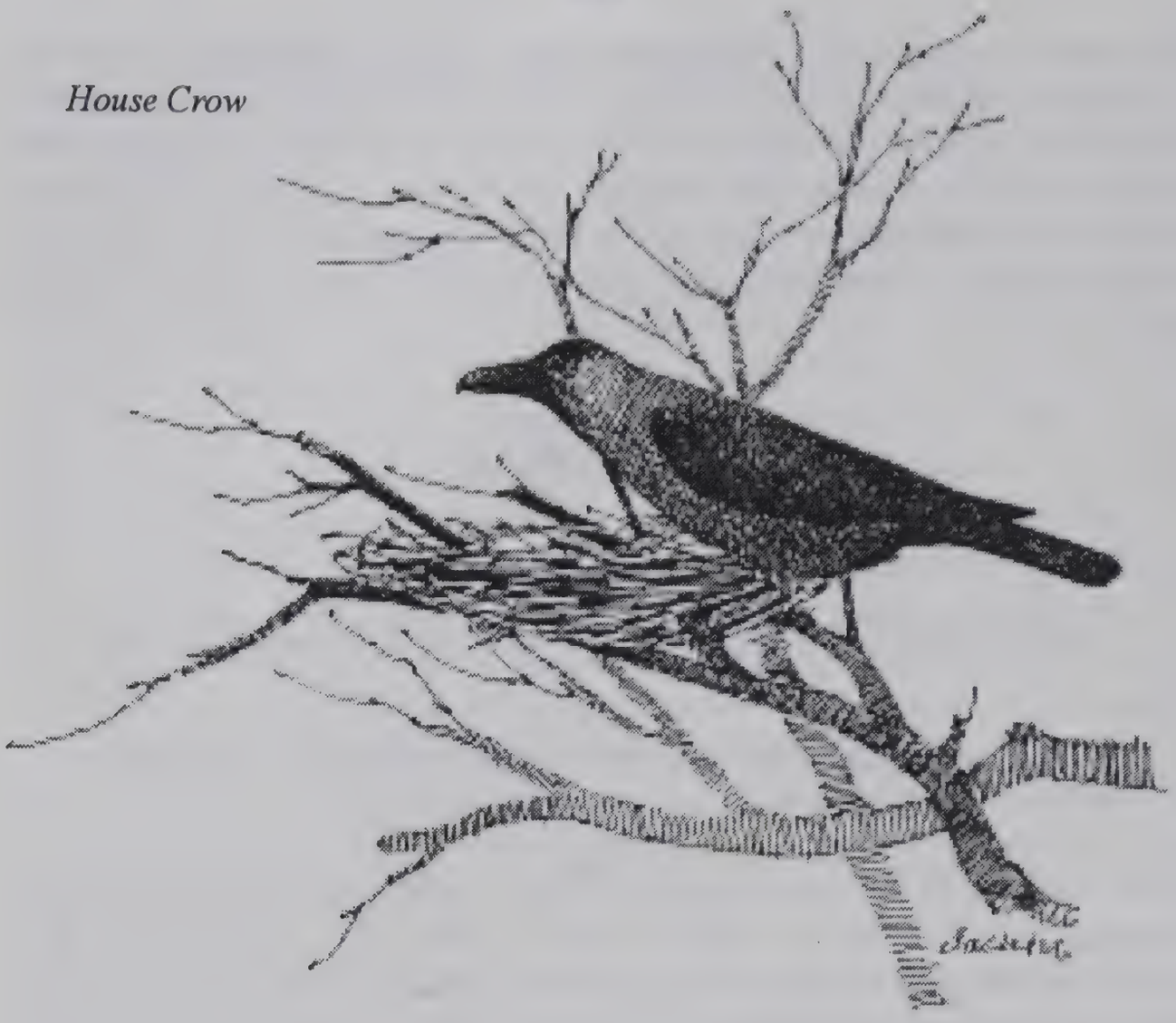
First reported by Saha and Dasgupta (1992), who collected a specimen of the subspecies *D. v.* pallida near Mollem, on 5th January 1969, during one of their collecting trips to Goa for the Zoological Survey of India. **Status**: A fairly common and widespread resident of all regions, from the coast to the lower slopes (up to *ca.* 200 metres) of the Western Ghats and their outlying hills, that is commonest in the coastal belt. **Habitat**: Well-wooded localities like coconut and mango groves in villages, gardens, patches of remnant semi-evergreen woods, eucalyptus and rubber plantations, moist deciduous, semi-evergreen and, occasionally, tall evergreen forest. **Population**: Mostly encountered in roving groups of up to 7-8 birds, rarely found singly. The Rufous Treepie is frequently a participant in mixed-species feeding parties in forest. **Seasonal status**: Present throughout the year, but appears to be slightly less common during the monsoon months, June through September.

(1036) **White-bellied Treepie** ***Dendrocitta leucogastra*** Gould

(Southern Tree Pie)

Status: Uncertain. Possibly a stray **Sightings**: A single bird was observed by Frost, Manville and the author in very dense, but not tall evergreen forest near the top of Dudhsagar waterfalls, at an altitude of *ca.* 600 metres and right on the border to Uttar Kanara district of Karnataka, on 20th April 2001. Niranjan Sant (pers. comm.), a keen birdwatcher from Belgaum, reported to have seen one individual in evergreen forest between Dudhsagar and Caranzol railway stations, at an altitude of *ca.* 300 metres, sometime in May 1995 or 1996.

House Crow



(1048-51) **House Crow** ***Corvus splendens*** Vieillot

(Indian House Crow)

First reported by Grubh and Ali (1976), who observed it at Mollem, Canacona and Panaji during their ornithological survey of Goa from 27th November to 12th December 1972. They considered it to be abundant and noted 'vast roosting congregations in trees around the Circuit House and in Panaji city, whitening the ground below.' **Status**: An abundant and almost ubiquitous breeding resident, from offshore islets to hill tribe hamlets in the forests at the foot of the Western Ghats. **Habitat**: Undiscerning and catholic in its habitat requirements, the House Crow is found wherever human habitation or, indeed, man is found. It is totally absent only from larger tracts of evergreen forest. **Population**: The greatest numbers of this species are found along the beaches and their immediate hinterland where tourism provides large quantities of refuse and unrecycled rubbish. Night roosts in large trees in all towns, even the smaller taluka towns, attract daily thousands of birds. **Breeding status**: The breeding season appears vaguely defined and prolonged, centering around the period from October to December.

(1054-57) **Large-billed Crow** ***Corvus macrorhynchos*** Wagler

(Jungle Crow, *Corvus levaillantii*)

First reported by Saha and Dasgupta (1992), who collected a specimen of the subspecies *C. m. culminates* around Valpoi, on 11th January 1969, for the Zoological Survey of India. **Status**: An uncommon, but widespread, locally fairly common resident and probable breeder that occurs in all regions, from immediately behind the seashore to the crest of the Western Ghats. **Habitat**: This crow is slightly less dependent on man than the House Crow and therefore found more often away from villages and habitation. Occurs also in extensive evergreen forests on the slope and crest of the Ghats. **Population**: Day counts in forested areas can be as high as 40 birds (Lassey 1999), along the coast numbers tend to be around 1-5 individuals. At the Goa Meat Complex abattoir up to 60 birds have been counted (Holt 1996b). **Breeding status**: Nest building was noted in mid-April on the crest of the Ghats.

ARTAMINI
Woodswallows

(982) **Ashy Woodswallow** ***Artamus fuscus*** Vieillot

(Ashy Woodshrike, Ashy Swallow-shrike)

First reported by Saha and Dasgupta (1992), who collected a pair in the Valpoi area, on 9th January 1969, during one of their collecting trips for the Zoological Survey of India. **Status**: A widely but patchily distributed, fairly common dry season and capricious monsoon visitor to all three regions, from immediately behind the seashore to the base and crest of the Western Ghats that is commonest in the coastal belt and at the foot of the Ghats. **Habitat**: Coastal casuarina and coconut palm plantations, village outskirts, paddy-fields, grassland with a scattering of trees, open deciduous forest, eucalyptus plantations, clearings and islands of paddy cultivation in semi-evergreen and evergreen forest etc. **Sites and sightings** (of over 10 birds): Morjim, Anjuna, Bondla WS, Mollem, Collem, Bhagwan Mahavir WS, Shiroda and Cotigao WS. **Population**: In the coastal belt, typical day counts of this highly gregarious bird are in the range of 2-8 individuals, though groups of up to a dozen are not uncommon. Flocks of 30-80 birds congregate on winter mornings and evenings and, occasionally, during the southwest monsoon over villages at the foot of the Ghats, e.g. Mollem and Collem. **Seasonal status**: Recorded in all months except September. This probably nomadic species shows two distinct seasonal peaks, a major one in the winter months November through January and a minor one immediately prior to and during the southwest monsoon, from May through August. The monsoon influx, which varies greatly from year to year and month to month, appears to depend on the intensity and pattern of rainfall.

ORIOLINI

Orioles, Cuckooshrikes, Trillers, Minivets and Flycatcher-Shrikes

(952-3) **Eurasian Golden Oriole *Oriolus oriolus*** (Linn.)

(Golden Oriole)

First reported by Saha and Dasgupta (1992), who collected the first of 15 specimens near Margao, on 18th December 1968. They ascribed them all to the subspecies *O. o. kundoo*. **Status**: A common and widespread winter visitor and very common bi-annual passage migrant that is found from the coast to the lower slopes (up to *ca.* 200 metres) and again on the crest of the Western Ghats. **Habitat**: Being strictly arboreal, this species is found in all types of woodland, from coastal mango topes and mangroves lining rivers and creeks to the semi-evergreen and evergreen forests of the Ghats. **Population**: Day counts usually range from 5 to 50 individuals and up to several hundred birds during passage migration, especially in spring. During the winter months, fruiting trees can attract large concentrations, e.g. 300+ birds in the Nagoa valley on 2nd January 1982 and 27th December 1985 and *ca.* 200 at the Saligao spring on 9th February 1998 (Marsh 1998). Similarly, these birds are fond of sunning themselves collectively on cold mornings at the edge of forest clearings, e.g. 50+ birds on 31st December 1999 and 80+ on 26th December 2000 at a glade in the Cotigao WS. **Seasonal status**: Autumn incoming passage begins between early and mid-September (earliest record: 29th August) and slows down in early October, leaving behind a substantial wintering population that thins out towards the end of March until hardly a bird is left by early April. The spectacular spring migration starts around 10th April and lasts usually into mid-May (latest record: 27th).

(954, 956-7) **Black-naped Oriole *Oriolus chinensis*** Linn.

First recorded when two birds were seen by the author (1999b) between Mollem and Collem, on 22nd November 1985. **Status**: Scarce and irregular visitor to forests at the base of the Western Ghats and their outlying hills. **Habitat**: Restricted to extensive moist deciduous, semi-evergreen and evergreen forests. **Sites and sightings**: Bhagwan Mahaveer WS (5 sightings), Cotigao WS (3), Bondla WS (3), Backwoods Camp (1) and between Tambdi Surla and Mollem (1). **Observers**: Duffield (2000), Frost (pers. comm.), Griggs (1996), Holt (1998b), Leigh (1998), Prasad (1999) and the author. **Population**: All records are of singles or pairs. Out of the altogether 13 records, three are most probably repeat-sightings of the same birds, reducing the total number of observed birds to 15. **Seasonal status**: Sightings span the period from 29th October to 15th March.

(958-9) **Black-hooded Oriole *Oriolus xanthornus*** (Linn.)

(Black-headed Oriole)

First reported by Saha and Dasgupta (1992), who collected the first of seven specimens belonging to the subspecies *O. x. maderaspatanus* between Mollem and Collem, on 15th January 1969. **Status**: A common breeding resident of parts of the coastal belt bordering on midland and isolated coastal plateaus, the midland region itself and of the belt of forests along the base and lower slopes of the Western Ghats (up to *ca.* 200 metres). Also occurs, after a gap of about 400 altitude metres, on the crest. **Habitat**: This species is very partial to the patches and strips of remnant semi-evergreen woodland along the base of plateaus and the valleys penetrating their scarp. Substantial numbers occur in moist deciduous and semi-evergreen forest. **Population**: Usually encountered in small groups, though loose flocks of 10-15 birds are not exceptional. Typical day counts range from three to 10 individuals. **Breeding status**: Apparently there are two breeding seasons, one prior to the southwest monsoon, from late March to mid-May, and another starting at the end of the rains, in late August. **Seasonal status**: The Black-hooded Oriole is present throughout the year though a substantial part of the population emigrates during the monsoon months, June through August.

(1072-5) **Large Cuckooshrike *Coracina macei*** (Lesson)

(Black-faced Cuckoo-shrike, *Coracina novaehollandiae*)

First reported by Saha and Dasgupta (1992), who collected a male specimen of the nominate race in the Valpoi area, on 15th January 1969, during one of their collecting trips to Goa for the Zoological Survey of India. **Status**: An uncommon and capriciously distributed resident mainly of the coastal belt of North Goa and the base of the Western Ghats and their outlying hills; scarce in the midland region. **Habitat**: This purely arboreal species is found in light woodland like orchards and mango topes, in well-wooded villages, in secondary, moist deciduous, semi-evergreen and not too dense evergreen forest. **Sites**: Terakol, Mandrem, Chopddem, Vironda, Parxem-Agarwaddo (Pernem); Assagao, Anjuna, Baga creek, Arpora, Nagoa valley, Tivim-Damedem, Fort Aguada (Bardez); Sattrem (Sattari); Corlim, Neura (Tiswadi); Bondla WS (Ponda); Mollem, Bhagwan Mahavir WS (Sanguem); Shirotim, Cotigao WS (Canacona). **Seasonal status**: Sightings are scattered almost evenly throughout the year, with only a slight decline in July and a minimal preponderance in May-June and October-November – hardly enough to suggest a passage migration of birds avoiding the southwest monsoon.

(1077) **Black-winged Cuckooshrike** *Coracina melaschistos* (Hodgson)

(Smaller Grey Cuckoo-shrike, Dark Cuckoo-shrike, Dark-grey Cuckooshrike)

First reported by Gibson (1998), who saw a single bird in the gardens of the Bondla WS on 24th February 1998. **Status**: A rare winter visitor to the coastal belt. **Other sightings**: Tunturi (1998) saw a pair at the eastern side of Carambolim lake on 2nd December 1998. Single birds were observed by C. Harris (1998) on the edge of a marsh at Sinquerim on 20th November 1998, by Lassey (2000) at Calangute on 16th January 2000 and the author in the Nagoa valley on 27th October 2001.

(1078-9) **Black-headed Cuckooshrike** *Coracina melanoptera* (Rüppell)

First reported by Saha and Dasgupta (1992), who collected the first of 8 specimens of *C. m. sykesi* between Mollem and Collem, on 31st December 1968. **Status**: An uncommon to locally fairly common dry season visitor and scarce breeding resident from coastal headlands to the crest of the Western Ghats. **Habitat**: Scrub; light woodland; remnant semi-evergreen woods along the scarp of plateaus; moist deciduous, semi-evergreen and, occasionally, even dense evergreen forest at the base, slope and crest of the Ghats. **Sites**: Terakol, Paliyem (Pernem); Tivim-Damedem, Assagao, Nagoa valley***, Baga, Alto Porvorim, Candolim, Sinquerim (Bardez); Mayem lake (Bicholim); Bondla WS (Ponda); Collem, Bhagwan Mahavir WS**, Kalay (Sanguem); Cotigao WS* (Canacona). **Population**: Singles and pairs are most commonly encountered. The highest numbers for any site appear to be the 12 birds Lassey (1999) recorded at the Bondla WS, on 18th January 1999. **Breeding status**: In the coastal belt, incubation was observed in July. **Seasonal status**: Recorded throughout the year. The population is at its lowest ebb during the south-west monsoon, from June through September. Numbers begin to pick up in October, reach their peak in the winter months and start dwindling again in March and April. **Miscellaneous**: This bird is frequently a member of mixed-species feeding parties.

(1089) **Rosy Minivet** *Pericrocotus roseus* (Vieillot)

First reported by Grubh and Ali (1976), who collected a female at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. They identified the subspecies as the nominate *P. r. roseus* and noted that it had 'no yellow except on the speculum, tail and under wing-coverts. Probably an immature bird.' **Status**: Unclear. Possibly a casual dry season visitor, mainly to the Cotigao WS. **Habitat**: Mainly tall moist deciduous and semi-evergreen riverine forest. **Sites and sightings**: Cotigao WS (8 sightings), Bondla WS (1). **Observers**: Frost (pers. comm.), Holt (1997), Tarrant (1997) and the author. **Population**: The majority of the altogether 9 sightings were of singles and pairs. Two sightings of a threesome and one

of a group of 5+ were of birds participating in a mixed-species feeding party. **Seasonal status**: All records are from the period between 1st December and 20th April.

(1090-5) **Small Minivet *Pericrocotus cinnamomeus*** (Linn.)

First reported by Saha and Dasgupta (1992), who collected the first of four specimens of the subspecies *P. c. malabaricus* in the Mollem/Collem area, on 4th January 1969. **Status**: A widespread and fairly common breeding resident of all three zones, from close behind the seashore to the middle slopes (up to about 200 metres) of the Western Ghats. **Habitat**: The Small Minivet is found in a wide variety of woodlands, from coastal gardens and groves to often fairly dry secondary, mixed and deciduous forest to semi-evergreen and, occasionally, dense evergreen forest. **Population**: Usually encountered in small groups four or five birds and loose flocks of up to 15 individuals that often form the nucleus of mixed-species feeding groups. Often found associated with Scarlet Minivets. **Breeding status**: Breeding was observed from late October to early January. **Seasonal status**: Recorded throughout the year with nearly constant frequency.

(1080-3) **Scarlet Minivet *Pericrocotus flammeus*** (Forster)

First reported by Saha and Dasgupta (1992), who collected a male specimen at Poinguinim, on 24th December 1968, during one of their collecting trips to Goa for the Zoological Survey of India. **Status**: A common, seasonally very common resident of the Western Ghats, from the base to the crest, and their outlying hills and hillocks that is also locally found at the eastern rim of the midland region. **Habitat**: All types of forest, from secondary and deciduous to dense evergreen. **Unusual sites**: Mayem lake, Savoi-Verem, Gaodongrem. **Population**: Groups of 4-8 of these very gregarious birds are met with most commonly and the sighting of 3-5 such groups in the course of day is not unusual. At the height of the southwest monsoon, when only resident species are present, the Scarlet Minivet is often the dominant species in forest. **Seasonal status**: Recorded in all months; no fluctuations were noted.

(1064-6) **Bar-winged Flycatcher-shrike *Hemipus picatus*** (Sykes)

(Pied Flycatcher-shrike, Pied Wood-shrike)

First reported by Grubh and Ali (1976), who collected a specimen of the nominate *picatus* at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A fairly common breeding resident of the midland region and the base and lower slopes (up to about 180 metres) of the Western Ghats that occurs locally also on the crest of the Ghats. **Habitat**: Very partial to patches of remnant semi-evergreen woodland on the lower scarp and in valleys of plateaus facing the coastal belt. Also found in teak plantations as well as riverine, semi-evergreen and dense evergreen forests. **Sites**: Terakol (Pernem); Assagao spring, Baga hill, Nagoa valley, Saligao spring, Tivim-Damedem (Bardez); Surla (Sattari); Mayem

lake (Bicholim); Carambolim (Tiswadi); Bondla WS (Ponda); Bhagwan Mahavir WS, Kalay (Sanguem); Cotigao WS (Canacona). **Population**: Mostly found in pairs or small groups of up to eight individuals. Day counts range from 3-15 birds. Loose groups of up to 25 birds are frequently members of mixed species feeding flocks in forest. **Breeding status**: Nest building was noted in late March, the feeding of fledglings in early May. **Seasonal status**: Recorded throughout the year with a fairly even spread of sightings.

DICRURINAE
Fantails, Drongos and Monarchs

(1454-9) **White-throated Fantail *Rhipidura albicollis*** (Vieillot)

(White-throated Fantail Flycatcher, Spot-breasted Fantail)

First reported by Saha and Dasgupta (1992), who collected the first of two specimens of the race *R. a. albogularis* near Ponda, on 16th March 1973. **Status**: The subspecies *R. a. albogularis* (Lesson) is a locally fairly common resident and probable breeder in the coastal belt, river basins and midland region. In the Western Ghats belt it occurs sporadically up to *ca.* 280 metres while it is probably an uncommon visitor on offshore islets. **Habitat**: Overgrown ruins and well-wooded gardens, even close to the seashore; groves of fruit trees; patches of remnant semi-evergreen woodland; mangroves and sea holly; occasionally also dense evergreen forest. **Sites**: Terakol, Paliyem (Pernem); Anjuna, Assagao, Nagoa valley, Baga ridge, Saligao spring, Sinquerim creek, Tivim-Damedem, Ucassaim (Bardez); Mayem lake (Bicholim); Chorao, Divar, Carambolim, Cumbarjua canal (Tiswadi); Bondla WS (Ponda); Rachol, Curtorim (Salcete); Bhagwan Mahavir WS, Selaulim (Sanguem). **Unusual sites**: Small numbers were found on the well-wooded eastern side of Navy Island, off Bogmalo, on 26th October 1986. There are three records from the Bondla WS by Rane (1984a), van der Dol (1999) and Lassey (1999) beside two from an altitude of *ca.* 120 and 280 metres along the Braganza Ghat section in the Bhagwan Mahavir WS. **Distribution**: This species has not yet been recorded south of a line from Margao to the Dudhsagar waterfalls. **Population**: Generally found in pairs, but congregations of 10-25 birds at a single site are not uncommon. **Breeding status**: There is circumstantial evidence of this species breeding in late April and throughout May and again at the end of the southwest monsoon, in August/September.

(962-4) **Black Drongo *Dicrurus macrocercus*** Vieillot

(*Dicrurus adsimilis*)

First reported by Grubh and Ali (1976) who collected a specimen at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972.

They were uncertain, which subspecies, *albirictus* or *macrocercus*, the specimen belonged to. Saha and Dasgupta (1992) collected nine specimens between 16th March 1973 and 2nd March 1978. They ascribed them all to the, then not nominate, race *D. adsimilis macrocercus* Vieillot. **Status**: A very common and widespread, locally abundant part resident, part dry season visitor that is found in all zones, from just behind the seashore to the foot of the Western Ghats. **Habitat**: The Black Drongo occurs on grassland, wasteland and at all types of cultivation in open areas, provided perches in the form of either trees or powerlines are available; also in and around villages, in light woodland and open deciduous forest etc. Occasionally it is found in patches of remnant semi-evergreen woodland and at stubble fields in forest clearings. **Unusual sites**: Two birds near the Tourist Bungalows in the Bondla WS, in mid-May 1984. **Population**: Typical day counts range between 10 and 40 birds, occasionally going up to 150 in January in the coastal belt (Lassey 1999). Unusually large concentrations were counted by Marsh (1998) in February near the Saligao spring while the author counted over 30 birds at the almost dry Carambolim lake in early June, over 70 around the ZAC reservoir in November and over 300 individuals in 0.5 sq.km of waterlogged fallow paddy-fields on Chorao in December. **Breeding status**: Feeding of a fledgling was observed on 24th July 2002 by Frost (pers. comm.). The fact that it took over 20 years of fairly intensive birdwatching to come up with the first breeding record in Goa shows how unusual an instance this must be. **Seasonal status**: Recorded in all months. A large part of the population leaves up to the end of May, presumably to escape the southwest monsoon and to breed. This movement appears to be a short-distance local migration (possibly up onto the Deccan Plateau) since every longer let-up or break in the rains brings a resurgence. Regular return takes place during late July and early August. A substantial proportion of the returning birds are juveniles.

(965-6b) **Ashy Drongo *Dicrurus leucophaeus*** Vieillot

(Grey Drongo)

First reported by Grubh and Ali (1976), who collected a specimen at Mollem and also observed it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. The specimen was identified on range as *D. l. longicaudatus*. **Status**: A common winter or dry season visitor to all three regions, from just behind the coast to the crest of the Western Ghats. **Habitat**: Mango groves and topes of large leafy trees, well-wooded gardens, isolated coppices in grass and wetlands, all types of woodland and forest – dry and moist deciduous, remnant semi-evergreen, secondary, semi-evergreen and primary dense evergreen. **Population**: Usually encountered singly or in pairs though flowering trees, especially silk cotton *Bombax spec.*, often attract sizeable and boisterous gangs of up to 20 birds. Several such flocks, adding up to over 200 individuals, frequented a valley at the Baga ridge on 24th February 1984. **Seasonal status**: Of all the winter visitors this species is the

most punctual. During 13 years of observation it arrived 9 times in the narrow time slot from 4th to 11th October and four times between 14th and 16th October. At the approach of the hot season, usually in mid-March, return migration sets in and the last birds leave Goa during the first 10 days of April (latest record: 19th). **Miscellaneous**: Groups of this energetic species form invariably the nucleus of mixed species feeding flocks in forests.

(967-9) **White-bellied Drongo *Dicrurus caerulescens*** (Linn.)

First reported by Saha and Dasgupta (1992), who collected the first of six specimens of the nominate race *D. c. caerulescens* in the Mollem/Collem area, on 31st December 1968, during one of their collecting trips for the Zoological Survey of India. **Status**: An uncommon, locally fairly common, breeding resident of the scarp of midland plateaus where they border onto the coastal belt, in the case of coastal headlands often close to the sea, as well as of the midland region proper and the foot of the Western Ghats, including their outlying hills and hillocks (up to about 100 metres). **Habitat**: Generally less densely wooded areas like the edges of remnant semi-evergreen woodland, secondary, light dry and moist deciduous forest, edges of forest clearings etc. **Favourite sites**: Terakol, Tuem (Pernem); Assagao valley, Baga hill and ridge***, Nagoa valley, Tivim-Damedem (Bardez); Mayem lake (Bicholim); Anjunem, Valpoi area (Sattari); Talaulim-Santana (Tiswadi); Bondla WS** (Ponda); Kalay, Mollem, Bhagwan Mahavir WS, Selaulim (Sanguem); Candollem (Quepem); Gaodongrem, Cotigao WS* (Canacona). Population: Almost exclusively encountered singly or in pairs, rarely in loose groups of up to eight birds. **Breeding status**: Incubation was noted in late April, feeding of fledglings in mid-June. **Seasonal status**: Recorded throughout the year in near constant numbers and with unchanging frequency.

(971) **Bronzed Drongo *Dicrurus aeneus*** Vieillot

(Little Bronzed Drongo)

First reported by Grubh and Ali (1976), who collected a specimen of the nominate *D. a. aeneus* at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A fairly common breeding resident of remnant patches of semi-evergreen woodland at the foot of plateaus and ridges in the coastal and midland region, common breeding resident throughout the forests of the Western Ghats, from the base to the crest. **Habitat**: Found almost exclusively in remnant and extensive semi-evergreen and evergreen forest, only occasionally in light woodland and secondary forest. **Population**: Typical day counts vary between three and 15 individuals. Generally encountered in boisterous and pugnacious gangs of three to 12 birds that frequently form, together with other drongo species, the active nucleus of mixed- species feeding flocks in forest. **Breeding status**: Nest building was noted in March-April, incubation in May and feeding of fledglings

and youngsters in June. **Seasonal status**: Recorded throughout the year with near constant frequency and in hardly varying numbers.

(973) **Spangled Drongo *Dicrurus hottentotus*** (Linn.)

(Hair-crested Drongo)

First reported by Grubh and Ali (1976), who collected two male specimens at Canacona and Valpoi during their ornithological survey of Goa from 27th November to 12th December 1972. The specimens were identified as belonging to the nominate race *D. h. hottentottus*. **Status**: A scarce, but apparently regular annual dry season visitor and probable bi-annual passage migrant that is found all along the base of the Western Ghats and their outlying hills and hillocks, up to an altitude of about 120 metres. **Habitat**: Secondary, dry and moist deciduous forest; edges of clearings and 'islands' of paddy cultivation in often extensive forests; especially fond of flowering silk cotton trees *Bombax* spec. **Sites and sightings**: Cotigao WS (17 sightings), Bhagwan Mahavir WS (11), Bondla WS (6), Backwoods Camp (3), Valpoi area (1), Saligao spring (1). **Population**: Generally seen singly or, occasionally, in twos, but flowering silk cotton trees can attract up to five birds. **Seasonal status**: Usually present from early November to early February. There are some indications of a low-intensity bi-annual passage migration with records of several birds as early as 13th September (Frost, pers. comm.) and as late as 13th March (Frost, pers. comm.) and 11th April (Burfield 1998).

(976-81) **Greater Racket-tailed Drongo *Dicrurus paradiseus*** (Linn.)

(Large Racquet-tailed Drongo)

First reported by Saha and Dasgupta (1992), who collected a female specimen of the Sri Lankan subspecies *D. p. lophorinus* two kilometres south of the Poinguinim Forest Rest House, on 22nd December 1968. They collected 11 specimens of the nominate subspecies *D. p. paradiseus* around the same locality and various other places in Goa for the Zoological Survey of India, between 1969 and 1979. **Status**: A fairly common, locally common breeding resident in the forests of the Western Ghats and their outlying hills, from the base to the ridge; uncommon resident in densely wooded valleys of the midland region and rare visitor to remnant patches of semi-evergreen woodland on west facing scarps of plateaus near the coast. **Habitat**: Found occasionally on outskirts of well-wooded villages, in eucalyptus and rubber plantations and generally in all types of forest, from secondary deciduous to dense wet evergreen. **Population**: Usually encountered in pairs or small groups of up to six birds. During southwest monsoon, this drongo is occasionally the most numerous bird species in forest: in July and August, up to 30+ individuals have been counted along a 4 kilometres long track through semi-evergreen and mixed forest in the Cotigao WS. This species is invariably a member of mixed species forest-feeding flocks. **Breeding status**: There are two distinct breeding seasons, one be-

fore the southwest monsoon, from April into early June, and another in September-October. **Seasonal status**: Present throughout the year in more or less constant numbers. **Remarks**: According to Baker (1924) the form *lophorhinus* occurs in Ceylon (=Sri Lanka) and South Travancore (=Trivandrum). But Ali and Ripley (1983) rate it as endemic in Ceylon. "The occurrence (of *D. p. lophorhinus*) in Goa is of immense interest from the zoogeographical point of view" (Saha and Mukherjee 1981). Ripley (1981), the leading taxonomist of the avifauna of the Indian subcontinent, writes: "The occurrence of this specimen and the reference in Baker (1924) to the presence of this phenotype in Kerala ('Travancore') confirms my own impression that *lophorhinus* of Sri Lanka is indeed most appropriately a subspecies of *paradiseus*, closely related, but with a single morphological character. That this tailtype is perhaps confined to a minor gene shift in the population of the mainland would seem to be confirmed by the method of collecting specimens or sight records, which of course represent an extremely random and haphazard sampling. More extensive field observations might reveal the presence of this tailtype character as a scarce recessive, while the phenotype has become localized and characteristic of the south-west Sri Lankan population ..." To Saha and Dasgupta (1992) the subspecies *lophorhinus* 'did not appear to be common in Goa' and they noted that it 'affects Sal and Cashew plantation', implying thereby that they had at least some additional sight records. However, the author has undertaken at least 68 full or half-day trips to the area and has not come across a single Greater Racket-tailed Drongo that even vaguely resembled the subspecies *lophorhinus* though a visiting birder claims to have seen one at Mollem, on 12th December 1996 (Griggs 1996).

(1465-9) **Black-naped Monarch *Hypothymis azurea*** (Boddaert)

(Black-naped Flycatcher *Monarcha azurea*)

First reported by Grubh and Ali (1976), who collected three specimens of *H. a. styani* at Valpoi and Mollem and also observed birds in the Maem Lake environs and at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. Saha and Daspupta (1992) collected six specimens at Mollem and Sanguem for the Zoological Survey of India, between 1973 and 1978, and ascribed them to the subspecies *H. a. styani*. **Status**: A fairly common, locally common breeding resident of Western Ghat forests, from base to crest, and uncommon non-breeding resident or visitor to limited areas in the midland and coastal regions. **Habitat**: Well-wooded gardens, remnant patches of semi-evergreen woodland, semi-evergreen and evergreen forest. **Sites**: Assagao valley, Baga ridge, Nagoa valley, Tivim-Damedem, Saligao spring, Candolim, Sinquerim (Bardez); Mayem lake (Bicholim); Surla, Valpoi area (Sattari); Talaulim-Santana (Tiswadi); Bondla WS (Ponda); Sancoale valley (Marmagoa); Tambdi Surla, Mollem, Collem, Bhagwan Mahavir WS (Sanguem); Gaodongrem, Cotigao WS (Canacona). **Population**: Usually seen in pairs, but loose groups of up to 10+ birds occur. This species rarely participates

in mixed feeding flocks in forest. Typical day counts range between four and eight birds and can go up to a dozen. **Breeding status**: In the Western Ghats strip breeding season is April-May-June. **Seasonal status**: Encountered throughout the year in unchanging numbers and with near-constant frequency.

(1460-4) **Asian Paradise-flycatcher** ***Terpsiphone paradisi*** (Linn.)

(Paradise Flycatcher)

First reported by Saha and Dasgupta (1992), who collected the first of nine specimens of the nominate race *T. p. paradisi* near Mollem, on 4th January 1969, while Grubh and Ali (1976) ascribed the specimen they took in the same area, in November-December 1972, to the subspecies *T. p. leucogaster*. **Status**: A fairly common and widespread dry season visitor to all three regions that is found from close behind the seashore to the ridge of the Western Ghats. **Habitat**: Very much like the Black-naped Monarch's, but in addition it occurs also in scrub, light woodland and dry and moist deciduous forest. **Population**: In the coastal belt and midlands, this species is usually encountered singly, while groups of up to five birds are common in the forested areas. Typical day counts are in the range of one to eight birds and can go up to 20 individuals. Singles and small groups are frequent members of the mixed species feeding flocks in forest. **Seasonal status**: The season's visitors arrive in mid-October (earliest record: 10th) and leave variously between late March and the second half of April (latest record: 15th May). **Miscellaneous**: Frequently the stunning white males with tail streamers are called 'white phase' birds or 'white morphs'. They are actually males of four years or more of age, while their rufous 'counterparts' are up to three years old (Ali and Ripley 1983). The proportion of white : rufous males works out as 2 : 1, according to the author's diaries of 22 years. It is close to impossible to calculate or even estimate the proportion of male : female birds, since first year males are almost identical in plumage to females.

AEGITHININAE

Ioras

(1097-1101) **Common Iora** ***Aegithina tiphia*** (Linn.)

(Iora)

First reported by Grubh and Ali (1976), who collected a specimen at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. The specimen was identified as *A. t. deignani* on range. **Status**: A very widespread and fairly common, locally very common breeding resident throughout Goa that is encountered from the coast to the crest of the Western Ghats. **Habitat**: Occurs wherever at least some bushes or trees are found, from pastures to mangrove thickets to dense evergreen forest. **Population**: Generally found singly or in pairs though

small groups and even veritable flocks are occasionally encountered. Day counts vary typically between three and 12 birds. **Breeding status**: A pair was observed feeding a fledgling Banded Bay Cuckoo *Cacomantis sonneratii* from mid-November to early December, in the coastal belt. **Seasonal status:** Recorded throughout the year in only minimally changing numbers.

MALACONOTINAE
Woodshrikes

(1067-8) **Large Woodshrike *Tephrodornis gularis*** (Raffles)
(*Tephrodornis virgatus*)

First reported by Grubh and Ali (1976), who collected two specimens of *T. g. sylvicola* at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. Saha and Dasgupta (1992) collected two specimens near Poinguinim and Pendral, in 1973 and 1978 and identified them as belonging to the subspecies *T. g. sylvicola.* **Status**: An uncommon resident of the Western Ghats and their outlying hills, from the base to about 250 metres, and very rare visitor to valleys of midland plateaus bordering onto the coastal strip. **Habitat**: This bird never strays out of semi-evergreen and evergreen forests. **Sites**: Valpoi area, Bhagwan Mahavir WS, Bondla WS and Cotigao WS. **Unusual sites**: Nagoa valley (single sighting). **Population**: Small groups of 2-5 birds are the norm though flocks of up to 15 and 20 birds occur, especially as members of mixed-species feeding parties. **Breeding status**: Breeding by this sedentary species is likely, but no proof exists apart from Saha and Dasgupta (1992) finding the specimen collected in March 1973 with enlarged gonads. **Seasonal status**: Recorded throughout the year with sightings spread fairly evenly over all months.

(1069-71) **Common Woodshrike *Tephrodornis pondicerianus*** (Gmelin)
(Lesser Wood-shrike, Indian Wood-shrike)

First reported by Grubh and Ali (1976), who observed it in the Mayem lake area, at Mollem and at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. Saha and Dasgupta (1992) identified the two specimens they had collected in March 1973 near Poinguinim as belonging to the nominate race *T. p. pondicerianus.* **Status**: A fairly common and sedentary, widely but patchily distributed resident of all three regions, from the coast to the base of the Western Ghats. **Habitat**: The Common Woodshrike prefers slightly drier habitat than the Large Woodshrike, occurring also in scrub jungle and dry deciduous, but not at all in dense evergreen forest. **Sites**: Terakol (Pernem); Anjuna, Baga ridge, Nagoa valley, Tivim-Damedem (Bardez); Mayem lake (Bicholim); Chorao-Tikanem, Divar-Piedade, Carambolim (Tiswadi); Bondla WS (Ponda); Kalay,

Bhagwan Mahavir WS, Selaulim lake (Sanguem); Cabo de Rama (Quepem); Cotigao WS (Canacona). **Population**: Day counts vary between one and six birds. Groups of more than 8 birds are rare though smaller groups regularly participate in mixed-species feeding flocks in forest. **Breeding status**: This species most probably breeds in Goa, but proof is still absent. **Seasonal status**: Recorded throughout the year with a slight dip in sightings in May-June and September-October.

MUSCICAPIDAE

TURDINAE
Thrushes and Shortwings

(1723) **Blue-capped Rock Thrush** ***Monticola cinclorhynchus*** (Vigors)
(Blue-headed Rock Thrush)

First reported by Grubh and Ali (1976), who collected four specimens at Mollem and Canacona, and observed others at the latter site during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: An uncommon winter visitor to the entire Western Ghats strip, including the outlying hills, scarce in gullies and ravines piercing the scarps of midland plateaus. **Habitat**: Moist deciduous, semi-evergreen and evergreen forests and woodlands. **Sites**: Nagoa valley* (Bardez); Mayem lake (Bicholim); Surla, Vagheri hill (Sattari); Sancoale valley (Marmagoa); Dona Paula (Tiswadi); Bondla WS*** (Ponda); Bhagwan Mahavir WS** (Sanguem); Gaodongrem, Cotigao WS (Canacona). **Population**: Usually seen in singles and pairs, with males predominant at a ratio of about 2.5 : 1 (Frost's and the author's records). **Seasonal status**: The wintering birds arrive in early November (earliest record: 29th October) and depart during the second half of March (latest record: 2nd April).

(1725-6) **Blue Rock Thrush** ***Monticola solitarius*** (Linn.)

First reported by Saha and Dasgupta (1992), who collected a male specimen of the subspecies *M. s. pandoo* in the Mollem/Collem area, on 2nd January 1969, during one of their many collecting trips to Goa for the Zoological Survey of India. **Status**: An uncommon dry season visitor, primarily to the coast, scarce in the midlands and on the slopes of the Western Ghats, up to about 250 metres. **Habitat**: This thrush is especially fond of rocky seashore and coastal cliffs, where it frequents rocks just a couple of metres above the tidal wash. Also encountered at coastal forts and fortifications, seawalls, harbour piers etc. In the Western Ghats it is found at cliffs and waterfalls. **Sites**: Terakol***, Morjim (Pernem); Anjuna, Chapora, Baga*, Fort Aguada (Bardez); Panaji-Campal, Dona Paula (Tiswadi); near Mayem lake (Bicholim);

Marmagoa harbour, ZAC reservoir, Zuarinagar, Bogmalo (Marmagoa); Dudhsagar railway station** and waterfalls, Mollem/Collem (Sanguem); Cabo de Rama (Canacona). **Population**: Usually encountered singly though loose groups of three birds have been observed. The male : female ratio is about 2 : 1. **Seasonal status**: Present from mid-October (earliest record: 7th) to late March (latest record: 4th April). There is a historical unseasonal sighting by Davidson (1898) at Marmagoa harbour, on 4th May 1893.

(1728) **Malabar Whistling Thrush** ***Myiophonus horsfieldii*** (Vigors)

First reported by Grubh and Ali (1976), who observed it at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: An Indian endemic, this sedentary bird is a fairly common, locally and seasonally common resident of the entire Western Ghats strip and the outlying hills and hillocks, scarcer in the midland region and, probably, only a scarce visitor to gullies and ravines on the scarp of coastal plateaus. **Habitat**: This thrush is found mostly, though not necessarily, near water and in dark and damp areas like culverts, railway tunnels, stream gullies, ravines etc. Also met with in mixed, semi-evergreen and wet evergreen forest, often quite far from water. **Sites**: Nagoa valley, Saligao spring, Candolim (Bardez); Surla, Anjunem, Sattrem, Nagargao (Sattari); Mayem lake (Bicholim); Bondla WS (Ponda); Velsao-Dorvoll (Marmagoa); Bhagwan Mahavir WS (Sanguem); Chandranath hill, Candollem (Quepem); Cabo de Rama, Cotigao WS (Canacona). **Population**: Usually encountered singly or in pairs. Typical day counts range from one to five birds. During southwest monsoon, especially in July, this species is frequently the most common and numerous bird along the Braganza Ghat, i.e. the railway line that climbs from Collem to Castle Rock (North Kanara, Karnataka). Occasionally participates in mixed-species forest feeding flocks. **Breeding status**: The Malabar Whistling Thrush is almost certainly a regular breeder during the southwest monsoon and circumstantial evidence, like territorial behaviour, courtship and song, points towards it, but direct proof is still absent. **Seasonal status**: Present throughout the year in only slightly varying numbers. **Remarks**: The full-throated song of the 'idle schoolboy' is generally heard from April to September, while during the remaining months only short and haltingly rendered snatches and a sort of subdued sub-song is heard.

(1733-6) **Orange-headed Thrush** ***Zoothera citrina*** (Latham)

(Orange-headed Ground Thrush)

First reported by Saha and Dasgupta (1992), who collected the first of 9 specimens on 26th December 1968, at Poinguinim. All of the specimens, collected between 1968 and 78 at various places, belonged to the subspecies *Z. c. cyanotus*. **Status**: The race *Z. c. cyanotus* (or White-throated Ground Thrush) is a fairly common, locally very common breeding resident throughout the state, from close behind the

seashore to the ridge of the Western Ghats. **Habitat**: Occurs in a variety of habitats with dense cover, like scrub jungle, overgrown gardens, cashew plantations, moist deciduous, semi-evergreen and wet evergreen forest. **Favourite sites**: Terakol, Keri (Pernem); Anjuna, Assagao, Nagoa valley, Tivim-Damedem, Baga ridge, Baga, Saligao spring, Candolim, Sinquerim, (Bardez); Surla, Valpoi area (Sattari); Chorao (Tiswadi); Savoi-Verem, Bondla WS (Ponda); Tambdi Surla, Collem, Bhagwan Mahavir WS (Sanguem); Shirotim, Cotigao WS (Canacona). **Population**: Invariably encountered singly or in pairs. **Breeding status**: Confirmed breeder in April, May and June with, possibly, a second breeding season in August-September. **Seasonal status**: The resident population is augmented by large numbers of monsoon visitors arriving in late March and staying on until mid-September. **Remarks**: There are two distinct seasons when the full-throated song is heard: from late March to late May and from mid-July to early September.

(1748) **Tickell's Thrush *Turdus unicolor*** Tickell

(Indian Grey Thrush)

Status: Vagrant (single record). Saha and Dasgupta (1992) collected a male specimen near Mollem, on 21st February 1978, during one of their collecting trips to Goa for the Zoological Survey of India. They state that 'this thrush appeared rare indeed in Goa. It was observed at the edges of forest. The specimen is a young male having olive-brown colour and slightly streaked throat. It is likely to be confused with a female Blackbird, but its rufous underwing coverts are diagnostic for the species. The species is previously known from as far southeast as northeastern Andhra [Pradesh]. Now, it is being recorded for the first time from Goa, i.e. beyond 16° latitude.' There are 10 sightings of this species by visiting birders, six of them from the 'pitta site' at Sinquerim, three from the Bondla WS and one from the Mayem lake area, between November and February of the years 1995 to 2000. Most of these records do not even mention the sex of the observed birds and all of them are most likely to be of misidentified Eurasian Blackbirds *Turdus merula*.

(1751-7) **Eurasian Blackbird *Turdus merula*** Linn.

(Blackbird, Common Blackbird)

First reported by Grubh and Ali (1976), who collected two specimens, one at Mollem and the other at Valpoi. They also observed it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. One of the specimens was assigned to *T. m. nigropileus* (Black-capped Blackbird) while the plumage and biometrics of the other were akin to *T. m. simillimus*. It differed from that form in its bill colouration however – 'dark with an orange gape' and thus resembling *nigropileus* rather than *simillimus* the latter apparently having a wholly orange bill. They discussed the possibility that it may have been an intergrade or that bill colour varied more than had been appreciated. Saha and Dasgupta (1992)

collected three male and a female specimens at Poinguinim and Mollem, in February 1978, and ascribed all of them to *T. m. nigropileus*. **Status**: Uncertain. Probably an uncommon dry season visitor to all three zones, from close to the coast to the ridge of the Western Ghats. **Habitat**: Dense undergrowth in patches of remnant semi-evergreen woodland and denser forests, including wet evergreen. **Sites**: Terakol, Paliyem (Pernem); Nagoa valley, Baga ridge, Saligao spring, Sinquerim* (Bardez); Surla (Sattari); Mayem lake (Bicholim); Bondla WS** (Ponda); Bhagwan Mahaveer WS*** (Sanguem) and Cotigao WS (Canacona). **Population**: Normally found singly and occasionally in pairs. **Breeding status**: There are no signs of this thrush's breeding though the song is heard, with increasing intensity, from late March to early June and territorial behaviour was noted in late April. Their sudden disappearance only days before the onset of the southwest monsoon could be due to their breeding in other parts of the peninsula where the rains are less torrential. **Seasonal status**: Not yet recorded in July, August and September. All sightings are from the period between 24th October and 6th June. **Subspecific status**: A discussion of the confusing array of subspecies and their intergrades that occur in Goa is pointless since their identification in the field will always be doubtful.

MUSCICAPINI
Old World Flycatchers

(1407) **Asian Brown Flycatcher** ***Muscicapa dauurica*** Pallas
(Brown Flycatcher, *Muscicapa latirostris*)

First reported by Saha and Dasgupta (1992), who collected a specimen in the Bhagwan Mahavir WS, on 4th October 1977, during one of their collecting trips to Goa for the Zoological Survey of India. **Status**: An increasingly uncommon, thinly but widely distributed dry season visitor throughout the state, from offshore islets (during autumn migration) to the crest of the Western Ghats. Possibly, it is a scarce resident at the base of the Ghats. **Habitat**: Occurs in a variety of woodlands, from coastal gardens, mango groves, bamboo clumps to extensive tracts of forest and even dense wet evergreen. **Sites**: Anjuna, Baga ridge, Baga, Parra-Verla, Nagoa valley, Candolim, Saligao spring, Porvorim (Bardez); Mayem lake (Bicholim); Chorao, Carambolim (Tiswadi); Navy Island (Marmagoa); Bondla WS (Ponda); Tambdi Surla, Mollem, Bhagwan Mahavir WS (Sanguem); Shirotim, Palolem, Gaodongrem, Cotigao WS (Canacona). **Population**: Invariably a solitary bird. Numbers were found decreasing steadily all over since the mid-eighties. **Seasonal status**: In autumn, the first birds arrive in mid-October (earliest record: 4th) and the last have left by the end of April (latest record: 23rd). The tattered looking specimen seen at Palolem at the height of the southwest monsoon, on 29th July 1996, might have been an (involuntary) oversummerer while the sighting of several birds in the moist

deciduous forest between Mollem and Collem, on 16th May 1996 could be a pointer to the existence of a small enclave of resident (and possibly breeding?) birds.

(1409) **Rusty-tailed Flycatcher** ***Muscicapa ruficauda*** Swainson
(Rufous-tailed Flycatcher)

First recorded on 22nd October 1986 in the Nagoa valley. **Status**: A casual and irregular autumn passage migrant and rare winter visitor that is found in the coastal belt and the Western Ghats strip, up to at least 500 metres. **Habitat**: Invariably encountered in moist, dark and dank places in a variety of dense woodlands and forests, from moist deciduous over remnant semi-evergreen to wet evergreen. **Sites and sightings**: Nagoa valley (six sightings), Bhagwan Mahavir WS (3), Cotigao WS (2), Batim (1), Bondla WS (1). **Observers**: Frost (pers. comm.), Holt (1996a), Senior (1997), Watts (1987), van der Wielen (1998) and the author. **Population**: All sightings were of single birds. **Seasonal status**: Out of the altogether 13 sightings six are clustered in the narrow time slot between 15th and 22nd October, strongly suggesting a short autumn passage. The remaining seven records are spread over the winter months, the latest on 12th March.

(1408) **Brown-breasted Flycatcher** ***Muscicapa muttui*** (Layard)

First reported by Grubh and Ali (1976), who collected four specimens of the nominate race *M. m. muttui* at Mollem and also observed it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: Uncommon, but fairly regular winter visitor to the Western Ghats, up to at least 500 metres, and to a couple of sites on the intersection of the midland and coastal region. **Habitat**: Damp and heavily shaded tracts in all kinds of woodland and forest, often near streams. **Sites and sightings**: Bondla WS (19 sightings), Bhagwan Mahavir WS (11), Cotigao WS (6), Saligao spring (3) and Nagoa valley (2). **Observers**: Dennis (1999), Duffield (2000), Frost (pers. comm.), Holt (1996a, 1996b, 1997, 1998a, 1998b, 1999), Prasad (1996), Willoughby (1997) and the author. **Population**: This flycatcher is mostly seen singly though up to six birds might be present in the same locality. **Seasonal status**: Present from mid-October (earliest record: 13th) to early March (latest record: 13th).

(1411-2) **Red-throated Flycatcher** ***Ficedula parva*** (Bechstein)
(Red-breasted Flycatcher, *Muscicapa parva, Ficedula albicilla*)

First reported by Grubh and Ali (1976), who collected a specimen at Mollem and also observed it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. The specimen was of the nominate subspecies *F. p. parva*. Saha and Dasgupta (1992) collected a male specimen, also of the nominate race, between Mollem and Collem, on 19th February 1978. **Status**: A fairly common

and widespread dry season visitor to all regions, from the coast to the base of the Western Ghats, up to about 150 metres. **Habitat**: Favours a wide variety of habitats, like gardens, bamboo clumps, mango groves, cashew orchards, fairly open woodland, scrub jungle, mixed eucalyptus and acacia plantations, fringes of forest clearings and, occasionally, even evergreen forest. **Population**: Invariably encountered singly. Day counts range from one to five birds. **Seasonal status**: The very punctual autumnal arrival takes place in mid-October (earliest record: 8th) and spring departure in mid-March (latest record: 2nd April). **Subspecific status**: Some of the visiting birders, especially P. Holt, have gone to great length to distinguish between the nominate form *F. p. parva* and the subspecies *F. p. albicilla*. Holt (*in litt.* 2000) rates the nominate form 'probably a very scarce winter visitor' and finds that *F. p. albicilla* 'is much more frequently encountered and is probably an uncommon to fairly common, widespread winter visitor.' He even lists a sighting of two 'apparent intermediates' at the Cotigao WS, on 3rd February 1996.

(1421-2) **Ultramarine Flycatcher** ***Ficedula superciliaris*** (Jerdon)

(White-browed Blue Flycatcher, *Muscicapa superciliaris*)

Status: Vagrant (single record). Grubh and Ali (1976) collected a male specimen of the nominate *F. s. superciliaris* in the Bhagwan Mahavir WS during their ornithological survey of Goa from 27th November to 12th December 1972. **Remarks**: Sporadic winter records of this Himalayan flycatcher extend all over the Indian peninsula, even well to the South of Goa.

(1445) **Verditer Flycatcher** ***Eumyias thalassina*** (Swainson)

(*Muscicapa thalassina*)

First reported by Grubh and Ali (1976), who collected two specimens of the nominate *E. t. thalassina*, one at Mollem and the other near Valpoi, and also observed it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: An uncommon but widespread winter visitor to the entire Western Ghats strip and its outlying hills, from the base to the ridge, and to gullies and ravines on the slope of midland plateaus bordering onto the coastal belt. Recorded only at a single site in the midlands. **Habitat**: Patches of remnant mixed and semi-evergreen woodland, dense bamboo clumps and most types of forest, from open deciduous to dense wet evergreen. **Sites and sightings** (only records by Frost, Holt and the author): Nagoa valley (20 sightings); Bhagwan Mahavir WS (12); Cotigao WS (7); Bondla WS (3); Mayem lake (2); Saligao spring (2); Terakol (1); Nanorem (1); Vagheri hill (1); Surla (1). **Population**: Mostly met with singly, rarely in pairs. Occasionally participates in mixed species forest feeding flocks. **Seasonal status**: By far the largest number of sightings is made in December, followed by November and January. This flycatcher is present from mid-November (earliest sighting: 2nd) to late February (latest record: 1st March).

(1446) **Nilgiri Flycatcher** ***Eumyias albicaudata*** (Jerdon)

(Nilgiri Verditer Flycatcher)

Status: Endemic to the southern Western Ghats, this flycatcher was recorded once in Goa as a vagrant. **Sighting**: Frost (pers. comm.) observed a pair at the Nagoa valley, an area of remnant semi-evergreen woodland on the scarp of a plateau jutting into the coastal belt, on 25th December 2001. **Remarks**: In its South Indian range this species is found at an altitude from 600 to over 2000 metres. That these two birds were encountered in Goa only 2-3 kilometres from the seacoast and at an altitude of less than a dozen metres seems to confirm their status as 'true' vagrants.

(1435) **White-bellied Blue Flycatcher** ***Cyornis pallipes*** (Jerdon)

(*Niltava pallipes*)

First reported by Grubh and Ali (1976), who collected four specimens (a male and three female (s) in the Bhagwan Mahavir WS and also observed it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: This endemic to the southern Western Ghats is an uncommon, probably breeding resident of the Goan section of the Ghats and their outlying hills, from the base to the crest, and of a single site in the midlands. **Habitat**: Very partial to herbaceous undergrowth in moist deciduous forest and to dark and dank stream gullies; also occurs in dense semi-evergreen, riverine and wet evergreen forest. Invariably found near water. **Sites**: Bhagwan Mahavir WS***, Bondla WS**, Cotigao WS*, Surla and Mayem lake. **Population**: Usually encountered singly or in pairs. Day counts can go up to four birds. **Breeding status**: Circumstantial evidence points to breeding in July-August. **Seasonal status**: Recorded in all months except September and October.

(1440) **Blue-throated Flycatcher** ***Cyornis rubeculoides*** (Vigors)

First reported by Grubh and Ali (1976), who collected two specimens of the nominate subspecies *C. r. rubeculoides* near Valpoi during their ornithological survey of Goa from 27th November to 12th December 1972. Saha and Dasgupta (1992) collected a female specimen, also of the nominate race, near Valpoi, on 23rd March 1973. **Status**: A rare winter visitor that has been recorded eight times, in all three regions, but mainly at the base of the Western Ghats. **Habitat**: Forest fringes and undergrowth of bushes and low trees in forest, even dense wet evergreen, also patches of remnant semi-evergreen woodland in gullies and ravines of midland plateaus bordering onto the coastal plain. **Sightings**: Frost (pers. comm.) observed a pair in the Nagoa valley, on 8th January 1997, and a female bird in the same locality on 28th January 2000. The author had sightings of a pair in the Cotigao WS on 18th January 1998, of a male at the same spot, on 28th December 1998, and of a female in a different section of the Cotigao WS, on 30th December 2000. Van der Dol (1999)

reported to have seen one bird at the Mayem lake on 9th February 1999 and two, one and two birds in the Bhagwan Mahavir WS, on 12th, 13th and 14th February 1999. **Seasonal status**: The records span the period from late November/early December to 23rd March. **Remarks**: Van der Dol's (1999) three sightings in the same locality on three consecutive days are most likely repeat sightings of the same birds, as are probably the author's two records from exactly the same spot in two consecutive winters, implying a very strong site fidelity of this species. It is unclear how Saha and Dasgupta (1992) could arrive at their notion that 'the Blue-throated Flycatcher is common in Goa in winter' since they do not even mention any additional sight records beside the collected specimen.

(1442-3) **Tickell's Blue Flycatcher** ***Cyornis tickelliae*** Blyth

(Tickell's Red-breasted Blue Flycatcher, *Muscicapa tickelliae*)

First reported by Grubh and Ali (1976), who collected four specimens at Mollem and the Valpoi area and also observed it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. Saha and Dasgupta (1992) collected two male specimens at Poinguinim and Pendral, in 1973 and 1978, and identified them as belonging to the nominate *C. t. tickelliae*. **Status**: A common and widespread breeding resident in all regions, from the coast to the crest of the Western Ghats (where it is rare on the upper slopes). **Habitat**: Found in overgrown ruins, relatively open gardens and mango groves, secondary jungle with stands of bamboo, remnant patches of semi-evergreen woodland and all types of forest, right up to wet evergreen. **Population**: This flycatcher keeps singly and joins mixed species feeding groups in forest only occasionally. Day counts of between 3-10 birds appear to be typical. **Breeding status**: Two distinct breeding seasons were noted: at the beginning of the southwest monsoon, in late May and throughout June, and at the end, in September-October. **Seasonal status**: Recorded throughout the year with sightings spread fairly evenly over the months.

(1448-9) **Grey-headed Canary Flycatcher** ***Culicicapa ceylonensis*** (Swainson)

(Grey-headed Flycatcher)

First recorded by the author (1999b), when he observed a single bird in the Bhagwan Mahavir WS, between Sonaulim and the base of Dudhsagar waterfalls, on 28th January 1986. **Status**: Uncertain. This flycatcher is either a very rare winter visitor or a vagrant at the base and lower slopes of the Western Ghats and their outlying hills, up to about 150 metres. **Sightings**: Willoughby (1995) reported the sighting of a single bird at the Bondla WS, sometime in November 1995. Frost (pers. comm.) observed one specimen at the Bondla WS, on 29th December 1998. Hall (1995) noted this species, with no other details, at the Cotigao WS on at least one date between 26th February and 10th March 1995.

SAXICOLINI
Chats

(1644-6a) **Bluethroat *Luscinia svecica*** (Linn.)
(*Erithacus svecicus*)

First recorded when a female bird was seen at the Baga creek, on 16th February 1985. **Status**: Uncommon, locally fairly common, winter visitor to wetlands in the coastal belt and river basins. **Habitat**: This chat is attracted mainly to saline wetlands where it is found in sedges, sea holly and other low vegetation along causeways and dykes; also, but to a lesser degree, encountered at brackish or freshwater sites, like remnant pools in stubble fields and grasslands, edges of tanks etc. **Sites**: Parxem-Agarwaddo* (Pernem); Anjuna, Verla-Canca, Baga creek**, Tivim-Damedem, Candolim, Sinquerim (Bardez); Chorao, Divar, Ciba-Geigy, Carambolim, Santa Cruz, Neura*** (Tiswadi); Zuarinagar (Marmagoa); Shiroda (Ponda); Rachol, near Mobor (Salcete). **Population**: Generally found singly, but up to over 10 birds can be counted at some wetlands, e.g. at Neura on 5th December 2000. Typical day counts are between one and five birds. **Seasonal status**: This winter visitor arrives in early November (earliest record: 24th October) and departs in mid-February (latest record: 28th).

(1650-1) **Indian Blue Robin *Luscinia brunnea*** (Hodgson)
(Blue Chat, *Erithacus brunneus*)

First reported by Willoughby (1994), who observed a male bird near the zoo entrance at Bondla, in November 1994. **Status**: Scarce dry season visitor to the Western Ghats strip, including outlying hills, from the base to the crest. **Habitat**: Invariably seen at or in undergrowth near streams in semi-evergreen and dense evergreen forest. **Sites and sightings**: Bondla WS (8 sightings), at the top of the Dudhsagar waterfalls (5) and near Mollem (1). **Observers**: Van der Dol (2000), Frost, Holt (1996b, 1997, 1999), Manville, Ransdale (1998), Willoughby (1994, 1997) and the author. **Population**: All the 14 records but one, which was of a male and two females, were of single birds. **Seasonal status**: Records cover the period between 12th November and 22nd April.

(1661-4) **Oriental Magpie Robin *Copsychus saularis*** (Linn.)
(Asian Magpie Robin, Magpie Robin, Robin Dayal)

First reported by Saha and Dasgupta (1992), who collected the first of 13 specimens near Valpoi, on 14th January 1969, during one of their collecting trips to Goa for the Zoological Survey of India. They ascribed all specimens to the nominate race *C. s. saularis*. **Status**: A very common and widespread breeding resident that occurs throughout most of the state, from the coast to the top of the Western Ghats, and is

absent only from the higher and steeper slopes of the Ghats. **Habitat**: This species is catholic in its habitat requirements. It is found mainly around human habitation, in villages, mango topes and gardens, but also in mangroves, rubber plantations, scrub jungle, dry and moist deciduous forest and, occasionally, even in densest wet evergreen forest. **Population**: Usually encountered in pairs. Typical day counts are between 3-10 birds. **Breeding status**: The main breeding season is April-May, with possibly another one at the end of the southwest monsoon, in August-September. **Seasonal status**: This sedentary species is recorded throughout the year with unchanging frequency and in constant numbers.

(1665-8) **White-rumped Shama** ***Copsychus malabaricus*** (Scopoli)

(Shama)

First reported by Grubh and Ali (1976), who collected a specimen at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. They tentatively identified the specimen as *C. m. malabaricus*. Two specimens, collected by Saha and Dasgupta (1992) near Mollem, in April 1973 and February 1978, were identified by them as belonging to the nominate *C. m. malabaricus*. **Status**: A fairly common, locally common resident at the base and on the lower slopes, up to *ca*. 150 metres, of the Western Ghats and their outlying hills; also occasional visitor to ravines and gullies on the scarp of midland plateaus bordering onto the coastal belt. **Habitat**: Densest undergrowth in moist deciduous, semi-evergreen and dense evergreen forest. **Sites**: Assagao, Nagoa valley, Baga ridge (Bardez); Surla, Kodal (Sattari); Bondla WS*** (Ponda); Tambdi Surla, Bhagwan Mahavir WS* (Sanguem); Cotigao WS** (Canacona). **Population**: Typical day counts are in the range of one to three birds, but at least 12 individuals have been counted during a day in the Bondla WS. **Breeding status**: This species most probably breeds regularly in Goa, but proof is still absent. The breeding season is likely to be April to June. Juvenile or immature birds were noted in September. **Seasonal status**: Recorded throughout the year. Numbers seem to be higher during the 'hot season' and the first half of the southwest monsoon, March to July, when this otherwise shy and unobtrusive bird becomes increasingly vociferous and noticeable. The song season begins in March when birds still sing haltingly. It reaches its peak in April-May and subsides in June-July. A secondary song season, characterized by a kind of sub-song, stretches from October through December. The only month when this bird stays silent is January. **Miscellaneous**: An attempt by this species to expand its range as resident into valleys and ravines on the scarp of plateaus bordering onto the coastal belt of Bardez, from 1984 to 1986, was apparently abandoned in the following years.

(1717-21) **Indian Robin *Saxicoloides fulicata*** (Linn.)

(Indian Chat)

First reported by Grubh and Ali (1976), who observed it at Canacona and described it as 'common generally' during their ornithological survey of Goa from 27th November to 12th December 1972. Saha and Dasgupta (1992) collected a specimen of the nominate *S. f. fulicata* near Ponda, on 18th March 1973, during one of their collecting trips for the Zoological Survey of India and described it as a 'not uncommon bird in Goa'. **Status**: Widespread and fairly common breeding resident of the coastal belt and midland region. **Habitat**: Prefers dry stony ground with short grass and a scattering of bushes, like lateritic plateaus, cashew plantations, edges of cultivation, open scrub jungle etc. **Population**: Generally encountered in pairs. Day counts between one and eight birds are the norm. **Breeding status**: Shanbhag and Gramopadhye (1996), describing aspects of the species' breeding behaviour from studies in the Goa University Campus, south of Panaji, noted that the species nests during April-June. **Seasonal status**: The Indian Robin, a sedentary bird of high site fidelity, is found in unvarying numbers throughout the year.

(1671-2) **Black Redstart *Phoenicurus ochruros*** (Gmelin)

First reported by Grubh and Ali (1976), who observed it at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A scarce and, possibly, irregular winter visitor to sites in the coastal belt and rare winter visitor to a single site in the midlands and a couple of sites at the base of the Western Ghats. **Habitat**: Open and park-like mango groves, scrub jungle, lateritic ridges and plateaus with a scattering of bushes, edges of cultivation etc. **Sites**: Tuem-Arabo, Morjim (Pernem); Arpora, Nagoa valley, Baga ridge (Bardez); Chorao-Tikanem, Carambolim fields (Tiswadi); outskirts of Ponda (Ponda); Cabo de Rama, Cotigao WS (Canacona). **Observers**: Anon (1998a), Claydon (1993), Dennis (1999), van der Dol (1999), Hill (1995), Jännes (1998), Lassey (2000), Leigh (1998), Newsome (*fide* Holt), Spalding (1998), Sykes (1999) and the author. **Population**: Invariably encountered singly. **Seasonal status**: Recorded in the period between 5th October and 27th February. **Miscellaneous**: During the winter seasons of 1987, 88 and 89, a female, presumably the same bird over three consecutive years, was observed frequenting a tiny mango tope in the Nagoa valley, indicating a high degree of site fidelity.

(1695-8) **Common Stonechat *Saxicola torquata*** (Linn.)

(Stonechat, Collared Bushchat, Siberian Stonechat)

First reported by Saha and Dasgupta (1992), who collected a specimen near Valpoi, on 29th September 1977, and identified it as belonging to the subspecies *S. t. indica*.

Status: A fairly common dry season visitor and passage migrant in the coastal belt and river basins, rare at the eastern rim of the midland region and the base of the Western Ghats. **Habitat**: Found in a variety of habitats, from stony wasteland, dry grassland and edges of saline marshes to tracts of dry scrub and barren lateritic plateaus and ridges. **Unusual sites**: Near Valpoi (Saha and Dasgupta 1992), Goa Meat Complex at Usgao (Holt 1996b). **Population**: Usually encountered singly. Normal day counts are of between one and six birds, though low double figure counts (up to 15 birds) are not exceptional. **Seasonal status**: The majority of birds arrive in early October (earliest record: 13th September), while departure stretches throughout March (latest record: 28th). Numbers are highest during a low-key autumn passage in the first half of October.

(1700-3) **Pied Bushchat** ***Saxicola caprata*** (Linn.)

(Pied Stonechat, Pied Chat)

First recorded at Anjuna on 14th October 1980. **Status**: A common and widespread, possibly breeding, dry season visitor that is found mainly in the coastal belt and river basins. **Habitat**: This species favours fallow and stubble fields, fringes of cultivation, dry grassland and open tracts of scrub jungle on stony plateaus and ridges. **Uncommon sites**: In the Cotigao WS, this bird is fairly common on the outskirts of villages and hamlets. **Population**: Typical day counts are of between one and eight birds. Generally encountered singly or in pairs. **Breeding status**: Though a pair with four juveniles has been seen on 19th May 1982 and a single juvenile on 22nd June 1996, breeding in Goa is unlikely or, at best, very rare. This species probably breeds during its absence from Goa, during the monsoon. **Seasonal status**: A typical 'monsoon fugitive', this species avoids the rains by departing from Goa in the first week of June (latest record: 22nd), just a few days ahead of the onset of the southwest monsoon, and returns in mid-September (earliest record: 28th August).

(1706) **Isabelline Wheatear** ***Oenanthe isabellina*** (Temminck)

(Isabelline Chat)

First reported by the author (1999b), when he observed three birds on a near-coastal plateau at Arpora-Parra, in December 1981. **Status**: A rare winter visitor to a handful of sites in the coastal belt and the adjacent part of the midlands. **Habitat**: Stony and barren or grassy lateritic plateaus, stubble fields and sandy areas behind beaches. **Sites and sightings**: Between one and five birds were seen by the author (1999b) on four occasions at stony wasteland next to the ZAC reservoir, in November-December of the years 1984, 85 and 86. At the same spot, single birds were observed on three occasions in November-December 1999 and 2000 (Frost and author). Wadsworth (1999) had several sightings of, presumably, the same single bird in a sand dune area at Candolim beach, in December 1998 and January 1999. Single birds were seen in the arid Baga fields on 12th December 1995 (Welland 2000) and from 9th up

to 19th February 2000. **Seasonal status**: Sightings cover the period from 17th November to 19th February.

STURNIDAE
Starlings and Mynas

(987-9) **Chestnut-tailed Starling *Sturnus malabaricus*** (Gmelin)
(Grey-headed Myna)

First reported by Saha and Dasgupta (1992), who collected four specimens of the subspecies *S. m. blythii* at Poinguinim, Chiplem (?), Panaji and Mollem, between 27th December 1968 and February 1978, during their collecting trips for the Zoological Survey of India. **Status**: This locally nomadic bird is a fairly common to locally common dry season visitor to the coastal belt, midlands and the base, lower and middle slopes of the Western Ghats, up to about 250 metres, and an uncommon to scarce resident or, possibly, monsoon visitor. **Habitat**: Found around cultivation, in open woodland, forest fringes and in light mixed, deciduous and not too dense semi-evergreen forest. These starlings are much attracted to berries of *Ficus* spp. and nectar of flowering *Bombax* ssp., *Salmalia malabarica* and *Erythrina indica*. **Population**: Flocks are generally small, single and low double figure counts being the norm, but occasionally larger parties are encountered, e.g. in fruiting trees or around forest clearings where hundreds of birds, together with Fairy Bluebirds *Irene puella* and various bulbuls and drongos, congregate on cool winter mornings to sun themselves. From mid-November to around mid-March, hundreds of birds assemble, often together with parakeets, bee-eaters and mynas, every evening at dusk at night roosts in coconut palms close to the seashore (e.g. Anjuna, Velsao, Kindlebagh etc.). **Breeding status**: There are no indications of this species' breeding in Goa. **Subspecific status**: The nominate race *S. m. malabaricus*, the subspecies *S. m. blythii* and intergrades between the two occur in Goa. The nomadic movements or local migrations of the two forms and their hybrids are so intricate that no clear picture emerges. *S. m. malabaricus*: Generally predominant in the coastal belt where it is encountered throughout the year, but only in small numbers during the southwest monsoon. Mixed flocks of *malabaricus/blythii* occur in February and August to October. *S. m. blythii*: Generally predominant in the Western Ghats strip where it is present at least from October to June. Flocks nearly always contain an admixture of *malabaricus* that can go up to 70%.

(994) **Brahminy Starling *Sturnus pagodarum*** (Gmelin)
(Brahminy Myna, Black-headed Myna)

First reported by Saha and Dasgupta (1992), who collected a female specimen at Sankarda (=Sancordem?), on 12th December 1973. **Status**: A scarce or uncommon

winter visitor to the coastal belt and river basins. **Habitat**: Cultivation with hedgerows or a scattering of trees, open scrub jungle and other thinly wooded areas. **Sites**: Terakol, Morjim (Pernem); Chapora, Anjuna, Baga, Nagoa, Parra, Saligao, Calangute, Sinquerim (Bardez); Carambolim, Ribandar, Dona Paula (Tiswadi); Majorda, Varca, Mobor (Salcete). **Distribution**: Found only in a narrow strip along the coast, extending 3-4 kilometres inland, except in the basin of the Mandovi where it reaches its eastern extreme of 14 kilometres. The southward distributional range ends at the southernmost tip of Salcete taluka. **Population**: Generally encountered in groups of 2-5 and, occasionally, in small flocks of up to 25 birds. **Breeding status**: 'A family party (an adult male, adult female and two fully grown but apparently recently fledged juveniles) seen at Morjim on 25th November 1998 gave the impression of having bred locally.' (Holt, *in litt.* 2000). **Seasonal status**: Recorded in the period from 1st October to 22nd March. It is unclear, on which findings Feare and Craig (1998) based their statement that 'in Goa, it is scarce during the late dry season (December – April) but occurs during the monsoon.'

(996) **Rosy Starling *Sturnus roseus*** (Linn.)

(Rose-coloured Starling, Rosy Pastor)

First recorded at Anjuna on 24th February 1981. **Status**: An uncommon to fairly common, regular and locally abundant irruptive dry season visitor, mainly to the

Rosy Starling

coastal belt and river basins, that is scarce in the midlands and at the base of the Western Ghats. **Habitat**: Outskirts of towns and villages, garbage dumps, wasteland, grassy and stony plateaus and ridges, stubble fields, mangrove-lined dykes along creeks and *bundhs* between saltpans. The Rosy Starling is invariably attracted to flowering silk cotton trees *Bombax* spp. **Unusual sites**: Dargal, outskirts of Collem, open areas in the Cotigao WS. **Population**: In a normal year birds are usually encountered singly, less commonly in parties of up to *ca.* 40 birds and only occasionally in groups of over 100 individuals, e.g. *ca.* 200 around Fort Aguada on 5th February 1998, *ca.* 200 at Santa Cruz on 9th February 1998 and *ca.* 150 around Dona Paula on 5th November 1998. Exceptionally, in incursion years, flocks of up to 2000 birds have been recorded, e.g. at Velsao on 23rd January 1986. **Seasonal status**: Rosy Starlings typically arrive in October, occasionally in mid-September or even earlier (earliest record: 1st September), and remain until mid-March (latest record: 15th April). Numbers usually reach a peak in December-January.

(1006-7) **Common Myna *Acridotheres tristis*** (Linn.)

(Indian Myna)

First reported by Grubh and Ali (1976), who observed it at 'Canacona and elsewhere – particularly around habitations' during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A surprisingly uncommon to scarce resident and fairly common monsoon visitor mainly to the coastal belt and river basins, scarce at a couple of sites at the foot of the Western Ghats. **Habitat**: Wasteland, stubble fields, paddy-fields under cultivation, grassland, vicinity of villages etc. **Uncommon sites**: Between Mollem and Collem, outskirts of Collem, 'islands' of paddy cultivation in the Cotigao WS. **Distribution**: A curious adherence to Goa's political borders is apparent in this myna's distribution. It is perfectly plausible that at the eastern border, which is formed by the natural barrier of the Western Ghats, Common Mynas should be much more numerous beyond the ridge e.g. at Castle Rock (North Kanara, Karnataka) than at the foot of the Ghats. However, this situation is repeated both at Goa's northern and southern borders, which follow no insurmountable physical features but were drawn solely for political expediency. While the Common Myna is scarce and far outnumbered by the Jungle Myna at Terakol, Goa's northernmost village, the ratio is reversed at Shiroda (Sawantwadi distr., Maharashtra), just six kilometres distant. In the case of the southern border, the reversal begins already in Canacona, Goa's southernmost *taluka*, but is even more drastic in the adjacent Karwar district of Karnataka. **Population**: Most dry season encounters involve singles, less often pairs or small parties of up to 10 individuals at a handful of mainly traditional sites primarily in the coastal belt. Birds frequently occur with Jungle Mynas. **Breeding status**: Breeding is suspected but not yet documented. **Seasonal status**: The small, localized resident population is augmented in mid-May by immigrants and every spell of heavy rainfall in June-

July brings a new influx until it is almost as common and numerous as Jungle Myna *A. fuscus*, in July-August. These summer visitors disappear by early October.

(1008) **Bank Myna *Acridotheres ginginianus*** (Latham)

First reported by the author (1999b), who observed three birds at Velsao, on 12th December 1984. **Status**: Almost certainly an introduced species that was a common resident at a single site in South Goa from at least 1984 to 2000. The distributional range of this North Indian endemic species reaches its southernmost point around Bombay. **Sites and population**: In the late seventies, a shantytown had sprung up around a large agrochemical factory at Zuarinagar and with it a population of Bank Mynas that was probably spawned by escaped cage birds. By 1985-86, this colony had grown to at least 400 birds, which used to shuttle between the shantytown of Zuarinagar, the paddy-fields of Velsao and the ZAC reservoir. From this peak the population dwindled rapidly to 150+ birds in 1988, then slowly to 25+ in 1999 and 2 in 2000. The last sighting of a Bank Myna at this site was on 13th December 2000. Two birds were seen on the outskirts of Calangute, on 5th February 1986. Crombet-Beolens (1997) recorded a single at Pilerne, sometime in March 1997, and Lassey (1999) spotted a single bird by the paddy-fields of Sonaulim, at the bottom of the Dudhsagar waterfalls, on 20th January 1999.

(1009-11) **Jungle Myna *Acridotheres fuscus*** (Wagler)

First reported by Grubh and Ali (1976), who observed it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. Saha and Dasgupta (1992) collected two specimens at Sankada (=Sancordem?) and Mollem in 1973 and 1977, which they identified as belonging to the subspecies *A. f. mahrattensis*. **Status**: A widespread, abundant and almost ubiquitous breeding resident from the coast to the foot of the Western Ghats. **Habitat**: Habitat requirements are more or less identical to the Common Myna's. **Population**: Day counts of between 20 and 100 birds are typical though larger counts are not exceptional. **Breeding status**: The Jungle Myna commonly breeds in April-June. A second breeding season apparently extends from August into October. **Seasonal status**: A part of the population appears to consist of 'monsoon fugitives' and turns nomadic during the southwest monsoon, June to September.

(1016) **Southern Hill Myna *Gracula indica*** (Cuvier)

(Hill Myna, Talking Myna, *Gracula religiosa*)

First reported by Rane (1984a), who observed it at Dudhsagar and Collem during one of his Goa trips from 18th – 24th May 1981, 6th – 10th April and 16th – 22nd June 1982. **Status**: A scarce resident or year-round visitor from forests adjacent to Goa. It is locally distributed on the lower and middle slopes the Western Ghats strip, up to about 200 metres. **Habitat**: Restricted to mixed and dense evergreen forest. **Sites**

and sightings: Bhagwan Mahavir WS (23 sightings), Bondla WS (2), Cotigao WS (2), Collem (2) and Tambdi Surla (1). **Observers**: Van der Dol (1999, 2000), Frost, Holt (1996a, 1997, 1998a, 1998b, 1999), Lassey (2000) and the author. **Population**: This gregarious species is always encountered in groups of at least 2-7 birds. Flocks of 10+ individuals were observed in the center of Collem village, of 12+ regularly at a night roost near the Sonaulim railway halt in the Bhagwan Mahavir WS and of 19 birds in the Cotigao WS. **Seasonal status**: Recorded in all months except April, June, September and October. The population appears to be highest in the winter months. **Miscellaneous**: A group of three apparently escaped cage birds were observed at Anjuna throughout May and June 1984. They stayed on in an unlikely habitat of coastal coconut palm groves, keeping almost constant voice contact with their unluckier, still incarcerated brethren.

SITTIDAE
Nuthatches and Wallcreeper

(1827-31) **Chestnut-bellied Nuthatch** ***Sitta castanea*** Lesson

First reported by Rane (1984a) who observed it at Mollem during one of his Goa trips from 18th – 24th May 1981, 6th – 10th April and 16th – 22nd June 1982. **Status**: Uncertain. Probably a stray. **Sightings**: There are altogether four records, all of them from the Bhagwan Mahaveer WS. Hill (1995, 1997) recorded two birds on 7th February 1995 and a single on 7th November 1997. Two individuals were seen by Vermeulen (2000) on 12th February 2000.

(1838) **Velvet-fronted Nuthatch** ***Sitta frontalis*** Swainson

First reported by Grubh and Ali (1976), who collected a specimen of the nominate *S. f. frontalis* at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A fairly common, seasonally common resident of the lower slopes of the Western Ghats and their outlying hills, up to *ca.* 150 metres; scarce on the crest of the Ghats. **Habitat**: This species never strays from forest – mixed, semi-evergreen and wet evergreen. **Sites**: Surla (Sattari), Bondla WS*, Bhagwan Mahaveer WS***, Gaodongrem, Cotigao WS**. **Population**: Generally found in groups of 2-5 birds. Flocks of up to 30+ individuals are frequent members of the mixed-species forest feeding parties. Day counts between 2 and 15 birds are typical. **Breeding status**: Breeding is suspected, but in the absence of even circumstantial evidence far from confirmed. **Seasonal status**: Recorded throughout the year. There is a – for an apparently sedentary bird – perplexing increase in numbers from May to August, with a clear peak in July. Holt (*in litt.* 2000) opines: 'Whether the species breeds immediately before the rains and its numbers are then swollen by juveniles or whether the species is just noisier and hence more conspicuous and therefore only perceived to be more common at that season is uncertain.'

PARIDAE
Tits

(1790-7) **Great Tit *Parus major*** Linn.
(Grey Tit, Cinereous Tit)

First reported by Rane (1984a), who noted it at the Bondla WS during one of his Goa trips from 18th – 24th May 1981, 6th – 10th April and 16th – 22nd June 1982. **Status**: Uncertain. Possibly a stray from the forests of Uttar Kanara, Karnataka. **Other sightings**: Three birds were observed by the author (1999b) in his garden at Anjuna, on 12th May 1988.

(1809-11) **Black-lored Tit *Parus xanthogenys*** Vigors
(Yellow-cheeked Tit, Black-spotted Yellow Tit)

First recorded on 2nd September 1980 at Anjuna. **Status**: This subcontinent endemic is a fairly common, probably breeding resident of the coastal and midland regions and a rare visitor to the Western Ghats (up to about 200 metres). **Habitat**: Found in a wide variety of wooded areas, from coastal gardens to semi-evergreen woodland. **Population**: Normally seen in pairs, rarely singly. Groups of up to 10 birds are not uncommon. **Breeding status**: The feeding of fully-fledged young by adults, observed by Holt (1998b, 1999) at Morjim and Baga in November-December and by Frost (pers.comm.) at Tivim in late October, suggests that local breeding is probable. **Seasonal status**: Recorded throughout the year in unvarying numbers and with near-constant frequency.

HIRUNDINIDAE
Swallows and Martins

(911) **Sand Martin *Riparia riparia*** (Linn.)
(Collared Sand Martin, Bank Swallow)

First recorded on 10th December 1996 by Holt (1996b), who observed a single bird at Baga. **Status**: Scarce winter visitor to the coastal belt and the base of the Western Ghats. **Habitat**: Invariably encountered hawking or perched over or near water. **Sites and sightings**: There are four sightings each from the Neura wetlands and Baga area and two sightings each from Santa Cruz creek and Mollem. Single records are from Arambol, Morjim, Chapora, Fort Aguada, Chorao, Divar, ZAC reservoir and the Cotigao WS. **Observers**: Dennis (1999), Frost (pers. comm.), Grigg (1996), Jännes (1997), Prasad, Tunturi (1998), van der Wielen (1998), Wilson (1997) and the author (1999b). **Population**: Usually encountered singly or in pairs, but groups of up to six birds have been observed. **Seasonal status**: Records span the period between 20th September and 24th January. **Remarks**: The status and

relative distributions of this and the following species, Pale Martin *Riparia diluta*, are uncertain. Until recently, the two have been considered conspecific. They are, especially when on the wing, very difficult to distinguish and most observers have not, at least until very recently, made efforts to separate them. This situation has led to a good deal of confusion and ambiguity. Therefore, *R. riparia* and *R. diluta* are still treated as conspecific in this account. However, suspected *Riparia riparia* has been reported twice, on 7th and 25th November 1998, by Jännes (1998) and Holt (1998b) and *R. diluta* on four dates, 10th December 1996 and 24th, 27th and 30th November 1998, by Holt (1996b, 1997).

[(910) **Pale Martin *Riparia diluta*** (Sharpe & Wyatt)]

(Sand Martin, *Riparia, riparia*)

See **Remarks** under **Sand Martin *Riparia riparia.***

(912) **Plain Martin *Riparia paludicola***

(Brown-throated Sand Martin, Plain Sand Martin, Grey-throated Sand Martin, African Sand Martin)

First reported by Claydon (1993) who observed 10-15 birds near Baga on 21st November 1993. **Status**: Presumably an occasional winter visitor to Goa. **Sites**: Morjim beach (Pernem); Siolim, off Anjuna-Vagator, Baga (Bardez); Mayem lake (Bicholim); Chorao, Carambolim lake, Goa Velha, Bambolim, Santa Cruz (Tiswadi); Bhagwan Mahaveer WS (Sanguem). **Observers**: Anon (1998a), Carthy (1998), Dennis (1999), Duffield (2000), Griggs (1996), Hill (1995), Holt (1996a), Lassey (2000), Prasad (1996), Willoughby (1997). **Population**: Mostly seen singly, but groups of 4-5, 7 and 10-15 have been recorded. **Seasonal status**: Sightings span the period from 25th November to 12th April.

(913) **Eurasian Crag Martin *Hirundo rupestris*** Scopoli

(Northern Crag Martin, Crag Martin, *Ptyonoprogne rupestris*)

First reported by Grubh and Ali (1976), who observed it at Valpoi during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: Scarce winter visitor to a few sites on the slope of the Western Ghats. **Habitat**: Sheer rocky cliffs and – a kind of 'ersatz' cliff –a 60 metres high concrete dam. **Sites and sightings**: Dudhsagar waterfalls and railway halt (13 sightings), Bhagwan Mahaveer WS (3), Surla (1) and Anjunem dam (1). **Observers**: Van der Dol (1999, 2000), Frost, Griggs (1996), Hill (1997), Tunturi (1998), Watts (1987), Willoughby (1997) and the author. **Population**: Flock size usually varies between 4 and 30 birds, but can go up to 200 (Griggs 1996). This species is often associated with Dusky Crag Martin *Hirundo concolor*. **Seasonal status**: Records cover the period from 8th November to 11th March.

(914) **Dusky Crag Martin *Hirundo concolor*** Sykes

(*Ptyonoprogne concolor*)

First recorded when a pair was observed feeding nestlings at Dudhsagar railway halt, on 23rd October 1980. **Status**: Uncommon breeding resident of all three zones, from the coast to the ridge of the Western Ghats; occasionally also irruptive winter visitor. **Habitat**: Encountered around rocky headlands, saltpans, fishponds, bridges and culverts in the coastal region, at dams of reservoirs in the midlands and at cliffs, railway tunnels and waterfalls in the Western Ghats strip. **Coastal sites**: Siolim, Baga, Fort Aguada, Nerul bridge, Britona (Bardez); Chorao, Panaji (Tiswadi); Cabo de Rama (Canacona). **Midland sites**: Selaulim dam (Sanguem); Karmal Ghat (Quepem). **Western Ghats sites**: Surla, Anjunem dam, Keri (Sattari); Mollem, Collem, Bhagwan Mahavir WS (Sanguem). **Population**: Sometimes met with in ones and twos, frequently in small flocks of up to 15 birds and occasionally in large flocks of several hundred (e.g. in November 1980 and 82, at the Dudhsagar waterfalls). **Breeding status**: Two breeding seasons were noted – February-March and September-October – in the Western Ghats region, while in the midlands breeding was recorded in February-March only and in the coastal belt in September-October. **Seasonal status**: Recorded throughout the year in numbers that change little over the seasons, except in some years when hundreds of apparently nomadic birds turn up during the winter months, especially November.

(916-8) **Barn Swallow *Hirundo rustica*** Linn.

(Swallow, Eurasian Swallow)

First reported by Grubh and Ali (1976), who observed it at Panaji during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A widespread and fairly common, in some years common winter visitor that is found throughout the coastal belt and river basins and, to a lesser degree, the midland region. **Habitat**: At one time or other, the Barn Swallow can be seen hawking over any terrain other than extensive forest. **Population**: Day counts in low two-digit numbers are typical, the largest flocks being in the region of 30-40 birds. **Seasonal status**: Arrival takes place from mid-September onwards though single birds might turn up even in late August (earliest record: 15th). The winter visitors depart relatively early, in late February and the first half of March (latest record: 19th).

(919-20) **Pacific Swallow *Hirundo tahitica*** Gmelin

(Hill Swallow, House Swallow, *H. domicola*)

Status: Vagrant. **Sighting**: On 25th March 1997, Frost and Manville (pers. comm.) observed a single bird perched among Red-rumped Swallows *Hirundo daurica* on a power line leading over pastures at the coastal village of Candolim. Presumably, the same bird was sighted again at the same site the following day. **Remarks**: The

Pacific Swallow is considered to be a resident of the hill ranges of southwest India, from extreme southern Karnataka south through Kerala and southwestern Tamil Nadu and is thought to be restricted to altitudes above 700 metres. A sighting of this species at a location *ca.* 450 kilometers north of the northernmost tip of its subcontinental distributional range, and that at sea level, is extraordinary indeed.

(921) **Wire-tailed Swallow *Hirundo smithii*** Leach

First reported by Saha and Dasgupta (1992) who collected a male and a female specimen at Canacona, on 15th February 1978, during one of their many collecting trips to Goa for the Zoological Survey of India. They ascribed both specimens to the subspecies *H. s. filifera*. **Status**: A fairly common and widespread breeding resident that occurs throughout Goa, from offshore islands and estuaries to rivers emerging from the base of the Western Ghats; also, though rarely, found at streams on the crest of the Ghats. **Habitat**: Rarely found far from waterbodies, be they saline, brackish or freshwater. **Population**: Single and low double-figure day counts are the norm. Assemblies of 25-35 birds are encountered occasionally, especially over flooded paddy-fields that are being plowed for the winter *vaingonn* crop. **Breeding status**: At the foot of the Ghats the breeding season extends from late December to late March. In the coastal belt, the period between late August and mid-October appears to be preferred. **Seasonal status**: Present throughout the year without the population undergoing any significant fluctuations.

(923-8) **Red-rumped Swallow *Hirundo daurica*** Linn.
(Striated Swallow)

First reported by Grubh and Ali (1976), who observed it at Mollem (where it was described as 'abundant on telegraph wires') during their ornithological survey of Goa from 27th November to 12th December 1972. They considered that the subspecies involved was *rufula* or *nipalensis*. Abdulali (1980), in a critique of the original paper, noted that *rufula* had 'not been authentically recorded south of the Himalayan foothills ... In the absence of any specimen, the suggestion that the subspecies be *rufula* seems to be unjustified.' **Status**: An uncommon breeding resident of the coastal belt and river basins and a very widespread and abundant winter visitor to all regions, from the shoreline to the crest of the Western Ghats, and an autumn and spring passage migrant in very large numbers that is encountered offshore and in the coastal strip. **Habitat**: This swallow is liable to be found anywhere, at one time or other, from the open sea to the forests of the Ghats. **Population**: During the 'cool weather' period (late October to February) parties of between 10 and 100 birds are the norm, but assemblies of up to 300 or 400 birds, often containing the occasional Barn or Streak-throated Swallow, are not unusual anytime from at least November to February. Larger counts, of up to 3-4000 birds in a flock, come from the period of autumn and spring passage. **Breeding status**: Nest building and activity at nests was ob-

served from late April until mid-August, suggesting that two broods are raised regularly. Traditional breeding sites, invariably used by a single pair only, are in and around villages e.g. Terakol, Arambol, Chopddem, Siolim-Marna, Arpora, Ciba-Geigy, Carambolim, Pilar, Agassaim and Velsao, and often at churches e.g. Anjuna, Assagao, Candolim, Saligao, Talaulim-Santana and Neura. **Seasonal status**: Autumn influx begins variously between 6th and 21st October, followed by very large numbers of passage migrants around 25th October. This passage migration lasts well into mid-November. Departure extends through the first half of March and is followed by a spring passage from late March to mid-April. **Migration**: On 7th October 1999, large numbers of Red-rumped Swallows were observed travelling south in a wide swath that reached from the shoreline to 3-4 kilometres offshore. From a fishing trawler, stationed about 20 kilometres off the North Goa coast, a steady trickle of these swallows was seen travelling eastward towards the shore, on 6th November 2001. These observations would suggest that at least part of the autumn passage migrants originates either from the southern Arabian Peninsula or from East Africa and reaches India's west coast by crossing the Arabian Sea. On 19th March 1985, several hundred Red-rumped Swallows and, on 14th April, about a thousand were seen sitting on the sand along the waterline at Morjim beach as if preparing for take-off. These curious sightings seem to underpin the suspicion of an overseas origin of these birds.

(922) **Streak-throated Swallow** ***Hirundo fluvicola*** Blyth

(Indian Cliff Swallow, Cliff Swallow)

First recorded when six birds were seen at the Velsao tank on 7th December 1981. **Status**: An uncommon, but widespread and regular winter visitor that appears somewhat erratically at wetlands in the coastal belt and river basins; once recorded at the base of the Western Ghats. **Habitat**: Invariably occurs in the neighbourhood of waterbodies. **Favourite sites**: Carambolim lake (12 sightings), Parxem-Agarwaddo wetlands (9), Baga creek (6), paddy-fields in the Cotigao WS (4), Curtorim tanks (4), Divar-Navelim (4), Velsao (3). **Other sites**: Morjim, Chapora, Anjuna, Calangute, Guirim-Nagoa, Nerul creek, Sinquerim creek, Chorao-Tikanem, Ciba-Geigy, Merces, Mollem, Shiroda wetlands, Chauri, Talpona, Galgibagh. **Population**: Rarely encountered singly. Groups of up to 10 birds are most common, but flocks of 30 and 70 have been observed at Carambolim lake and of at least 100 individuals at the Parshem-Agarwaddo paddy-fields. **Seasonal status**: The visitors arrive usually in early November (earliest record: 24th October) and depart towards the end of March, with a few records sprinkled through April and into May (latest record: 19th). Peak numbers are counted in December-January.

(930) **Northern House Martin** ***Delichon urbica*** (Linn.)

(Common House Martin, Eurasian House Martin, House Martin)

First recorded on 26th December 1995 near Mollem. **Status**: A scarce and irregular winter visitor to all regions, from coastal cliffs to the ridge of the Western Ghats. **Sites**: Terakol, Morjim (Pernem); Anjuna, Baga, Calangute, Nerul, Fort Aguada (Bardez); Surla (Sattari); Mayem lake (Bicholim); Chorao-Tikanem, Talaulim, Cumbarjua canal (Tiswadi); Usgao (Ponda); Tambdi Surla, Mollem, Bhagwan Mahaveer WS (Sanguem); Cotigao WS (Canacona). **Population**: The majority of sightings are of singles and groups of up to four birds though small flocks of 10 and 13 birds have been recorded at Mayem lake and in the Bhagwan Mahaveer WS. **Seasonal status**: All records fall into the period from 10th November to 21st April. **Remarks**: The status of the Northern House Martin prior to its first sighting in December 1995 is puzzling. It is highly unlikely that all observers should have overlooked this species.

PYCNONOTIDAE
Bulbuls

(1114) **Grey-headed Bulbul** ***Pycnonotus priocephalus*** (Jerdon)

First reported by Grubh and Ali (1976), who collected specimens at Mollem and Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: This southwest Indian endemic is a fairly common, locally and seasonally common and sometimes even very common resident that is widely, but patchily distributed throughout Goa, from coastal headlands to the crest of the Western Ghats. **Habitat**: Found in dense scrub near forest, patches of remnant semi-evergreen woodland and dense mixed, moist deciduous, riverine, semi-evergreen and evergreen forest. **Sites**: Terakol, Paliyem (Pernem); Assagao, Ucassaim, Tivim-Damedem, Nagoa valley*, Baga ridge, Fort Aguada (Bardez); Honda, Surla, Sattrem (Sattari); Naroa, Carambolim, Talaulim-Santana (Tiswadi); Bondla WS** (Ponda); Collem, Bhagwan Mahaveer WS** (Sanguem); Neturlim (Sanguem); Fatorpa, Cabo de Rama (Quepem); Gaodongrem, Cotigao WS*** (Canacona). **Population**: Usually encountered in pairs or small groups of up to 5 or 6 birds. Flocks of over 15 individuals are not infrequently seen in berry-laden trees and flocks of up to 20 birds participate in the mixed species feeding groups in forest. **Seasonal status**: Recorded throughout the year. During the hot season, mid-March to early June, this species appears to turn locally nomadic and is often absent from large tracts of forest, only to be one of the most common birds of the same locality the next day.

(1115-7) **Black-crested Bulbul *Pycnonotus melanicterus*** (Gmelin)

(Black-headed Yellow Bulbul)

First reported by Saha and Dasgupta (1992), who collected the first of three specimens of the subspecies *P. m. gularis* at Poinguinim, on 27th December 1968, during one of their collecting trips for the Zoological Survey of India.. **Status**: The beautiful and unobtrusive subspecies *P. m. gularis*, also called Ruby-throated Yellow Bulbul, is a fairly common, locally and seasonally common resident of the Western Ghats, from the outlying hills and base to at least 550 metres; it is scarce on the crest and in valleys near Cabo de Rama where a spur of the Western Ghats abuts onto the sea. Goa lies at the northern extremity of the Western Ghats range of this race and Ali and Ripley (1973) doubted the occurrence of this species and race in Goa until Grubh and Ali (1976) collected four specimens (all of them *P. m. gularis*) in Goa during their ornithological survey from 27th November to 12th December 1972. The Goa Government went one step ahead and promoted this bulbul to the questionable status of 'State Bird'. **Habitat**: The Black-crested Bulbul inhabits scrub jungle and all types of forest along the Western Ghats strip. **Population**: Found mainly in groups of 3-6 individuals, often as participants in the mixed-species feeding flocks. Day counts range typically between five and 15 birds, but can go up to over 50 (February 1999, in the Bondla WS). **Breeding status**: This species is most likely to breed in Goa, but direct proof is still absent. However, Saha and Dasgupta (1992) found that a male and a female specimen, collected in February 1978 at Mollem and near Valpoi, had the testes and ovary enlarged. **Seasonal status**: Recorded throughout the year in insignificantly varying numbers.

Red-whiskered Bulbul *Pycnonotus jocosus* (Linn.)

First reported by Grubh and Ali (1976), who collected a specimen of the form *fuscicaudatus* at Mollem and also observed it at Canacona and Mayem during their ornithological survey of Goa from 27th November to 12th December 1972. Saha and Dasgupta (1992) collected 12 specimens at various places between 1973 and 78 during their collecting trips to Goa for the Zoological Survey of India. They identified all specimens as belonging to the subspecies *P. j. fuscicaudatus*. **Status**: An abundant, ubiquitous and very widespread resident in the entire state, from coastal headlands to the crest of the Western Ghats. **Habitat**: This bird is one of the most catholic in its habitat requirements, appearing at one time or other wherever a few bushes or trees are found. **Population**: Usually encountered in gangs of up to 10 birds, but certain flowering and fruiting trees can attract hundreds to even small woodlands. **Breeding status**: Breeding was noted in March, April and May with a second season following at the end of the southwest monsoon, in August-September. **Seasonal status**: Apparently nomadic visitors increase numbers during the fruiting season in April-May, while during the monsoon months June, July and August at least a part of the resident population turns nomadic to evade the heaviest rains.

(1126-32) **Red-vented Bulbul** *Pycnonotus cafer* (Linn.)

First reported by Grubh and Ali (1976), who noted the species at Mollem and Canacona during their ornithological survey from 27th November to 12th December 1972. Saha and Dasgupta (1992) collected 13 specimens at various places between 1973 and 78, during their collecting trips for the Zoological Survey of India. All the specimens were identified as belonging to the nominate race *P. c. cafer*. **Status**: A widespread and common breeding resident in all zones, from the coast to the base of the Western Ghats; it also occurs on the crest of the Ghats. **Habitat**: Found in a variety of usually secondary habitats ranging from light woodland, gardens and scrub in the coastal belt to the edge of forests at the base of the Western Ghats. **Population**: This species keeps solitary or in pairs. Day counts of between one and 10 birds are the norm. **Breeding status**: Breeding was noted in April-May and feeding of nestlings in June. **Seasonal status**: This sedentary bird is present throughout the year in unvarying numbers.

(1138-9) **White-browed Bulbul** *Pycnonotus luteolus* (Lesson)

First reported by Grubh and Ali (1976), who collected a specimen of the nominate race at Canacona (and described it as 'common in bush country') during their ornithological survey of Goa from 27th November to 12th December 1972. Saha and Dasgupta (1992) collected 12 specimens between 1973 and 78 at Poinguinim, Valpoi and Mollem and ascribed all of them to the nominate *P. l. luteolus*. **Status**: This subcontinent endemic is a fairly common and widespread resident and probable breeder in all three regions, from coastal headlands to the foot of the Western Ghats. **Habitat**: Found in scrub jungle and *Lantana* bushes, gardens, mangroves lining tidal creeks, dry and moist deciduous woodland etc. **Population**: Generally found singly or in pairs. Day counts are between one and six birds and tend to be on the low side since this inveterate skulker is easily overlooked. **Breeding status**: Circumstantial evidence points to their breeding in April-May. **Seasonal status**: Present throughout the year in constant numbers.

Yellow-browed Bulbul *Iole indica* (Jerdon)

(*Hypsipetes indicus, Iole icterica*)

First reported by Grubh and Ali (1976), who collected five specimens at Valpoi and also observed it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. They ascribed the specimens to the nominate race *I. i. indica*, possibly going only by distributional range, while Saha and Dasgupta (1992) identified all the five specimens they collected between 1973 and 78 at Sanguem and Mollem as belonging to the subspecies *I. i. ictericus*. **Status**: This Indian subcontinent endemic is a generally fairly common, locally and seasonally very common resident throughout the Western Ghats, from the foothills to the crest

(where it is abundant); it is also found on a couple of the outlying hills. **Habitat**: Restricted to extensive forests – moist deciduous, semi-evergreen and wet evergreen. **Sites**: Surla, Vagheri hill, near Valpoi (Sattari); Bondla WS (Ponda); Tambdi Surla, Bhagwan Mahavir WS (Sanguem); between Gaodongrem and Mangal, Cotigao WS (Canacona). This species has not yet been recorded outside its very restricted Western Ghats distributional range. **Breeding status**: The sighting by Frost (pers. comm.) of a family party with fledglings at the top of the Dudhsagar falls, on 21st April 2002, can be taken at best as inconclusive proof of this species' breeding in Goa because of its proximity to the border. **Population**: Generally occurs in pairs or small parties of 5-7 birds. Typical day counts at the foot of the Ghats are in the range of 2-20 individuals while on the crest hundreds might be seen within a few hours. This bulbul is a frequent and very prominent member of mixed species forest feeding flocks. Since the late eighties, the population of the foothills appears to be in the grip of a steady, though not steep, and inexplicable decline. **Seasonal status**: Numbers of this species at any given locality vary to a great extent over the seasons and from year to year. It is impossible to discern any underlying pattern to these seemingly erratic movements and they are probably due to the basically roving or even nomadic nature of the Yellow-browed Bulbul.

(1148-51) **Black Bulbul *Hypsipetes leucocephalus*** (P. L. S. Müller)

(Grey Bulbul, *Hypsipetes madagascariensis*)

First reported by Grubh and Ali (1976) who observed it at Mollem and Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A dry season visitor to the entire Western Ghats region, including a couple of the outlying hills, that is uncommon at the base and on the slopes and very common to abundant on the crest. **Habitat**: Occasionally encountered in eucalyptus and acacia plantations and secondary forest, but its preferred habitat is broken semi-evergreen and wet evergreen forest. **Sites**: Surla, Vagheri hill (Sattari); Bondla WS (Ponda); Tambdi Surla, Backwoods Camp, Mollem, Bhagwan Mahavir WS, Neturlim (Sanguem); Cotigao WS (Canacona). Like the Yellow-browed Bulbul, this species never strays from its narrowly circumscribed habitat and distributional range. **Population**: This gregarious and very mobile species is usually seen in small parties of 2-10 individuals. Flocks comprising sometimes hundreds of these boisterous and extremely noisy birds can be observed sunning themselves, often in the company of Fairy Bluebirds, on cool winter mornings on the fringes of forest clearings in the Cotigao WS. **Seasonal status**: This bulbul disappears from Goa a month before the onset of the southwest monsoon (latest record: 8th May) and returns usually in October (earliest record: 17th September).

CISTICOLIDAE
African Warblers

(1498-1500a) **Zitting Cisticola** ***Cisticola juncidis*** (Rafinesque)

(Fan-tailed Warbler, Fan-tailed Cisticola, Streaked Fantail Warbler)

First recorded on 24th May 1982 at the Baga creek. **Status**: A seasonally and locally fairly common breeding resident of the coastal belt and river basins; scarce and very local in the midlands and at the foot of the Western Ghats. **Habitat**: Invariably found at paddy-fields with standing crop; it also favours extensive dry and marshy grasslands, saline wetlands with large areas of sedges or sea holly etc. **Favoured sites**: Morjim, Parxem-Agarwaddo wetlands* (Pernem); Anjuna fields, Assagao, Baga creek and fields**, Calangute and Candolim fields, Sinquerim (Bardez); Chorao-Tikanem, Divar**, Ciba-Geigy, Carambolim fields, Neura wetlands***, Santa Cruz fields, Dona Paula (Tiswadi); ZAC reservoir (Marmagoa); Shiroda wetlands (Ponda); Mobor (Salcete). **Unusual sites**: Grassland between Mollem and Collem, Cabo de Rama headland, Canaguinim plateau. **Population**: Usually seen singly or in pairs. Day counts of up to three or four birds are the norm. **Breeding status**: Activity at nest was observed in late June in the Ciba-Geigy compound. **Seasonal status**: Recorded throughout the year in fluctuating numbers. The activities of this species appear to be closely linked to the two paddy-growing seasons, i.e. the rain-fed one from June to October and the irrigated *vaingonn* season from mid-November to March. The periods when this bird's distinctive 'zitting' calls are heard and that are presumably also it's breeding seasons, i.e. late January to early April and early June to late October, largely coincide with these agricultural seasons. During the remaining months, the Zitting Cisticola is an unobtrusive and probably much overlooked bird.

(1502-5) **Grey-breasted Prinia** ***Prinia hodgsonii*** Blyth

(Hodgson's Prinia, Ashy Wren-Warbler, Franklin's Wren-Warbler)

First recorded on 24th June at Arpora. **Status**: A common and widespread resident that occurs mainly in the coastal belt and river basins and is scarce in the midland region and at the foot of the Western Ghats. **Habitat**: Encountered at village outskirts, margins of cultivation, mango and cashew orchards, brush and scrub jungle, forest edges and semi-evergreen forest. **Distribution**: This species is commonest in Pernem, Goa's northernmost *taluka*, followed by coastal Bardez and Tiswadi. South of the Zuari river, it becomes increasingly uncommon and is scarce in Canacona, the southernmost *taluka*. **Population**: Being more gregarious than the other prinias, this species is mostly met with in groups of 2-10 birds though a small flock of 20 was noted once in November (Holt 1997). **Breeding status**: Breeding is very likely, but

not yet documented. **Seasonal status**: Recorded throughout the year in unvarying numbers. The species might seem less numerous in November-December, the only months when the rattling song is not uttered constantly.

(1515-8) **Ashy Prinia *Prinia socialis*** Sykes

(Ashy Wren-Warbler)

First recorded on 2nd January 1981 at Velsao. **Status**: This subcontinent endemic is a patchily distributed, fairly common and locally common resident of the coastal region, including the river basins; it is scarce in the midlands and at the base of the Western Ghats. **Habitat**: The preferred environment is saline, e.g. ankle-high beach vegetation, scrub between sand dunes, dykes between saltpans, bushes lining tidal creeks and rivers, mangrove swamps and sea holly patches. Also encountered at margins of freshwater pools and tanks as well as village outskirts, railway cuttings, scrub jungle etc., often far from water. **Distribution**: Like the Plain and Grey-breasted Prinia, this species is not found south of a line from Velsao to Collem. Not yet recorded in Salcete, Quepem and Canacona *talukas*. The only known midland sites are Mayem lake (Bicholim) and the area around the Selaulim dam (Sanguem). At the foot of the Ghats, the Ashy Prinia is restricted to the outskirts of Mollem and Collem. **Population**: Day counts in the region of 3-15 birds are the norm. **Breeding status**: The Ashy Prinia almost certainly breeds in Goa, but conclusive proof is still lacking. **Seasonal status**: Encountered with equal frequency and in unvarying numbers throughout the year.

(1510-14) **Plain Prinia *Prinia inornata*** Sykes

(Plain Wren-Warbler, *Prinia subflava*)

First recorded at the Baga creek on 1st April 1983. **Status**: A fairly common, patchily but widely distributed breeding resident that is found mainly in the coastal belt and river basins and occasionally at the foot of the Western Ghats. **Habitat**: Brush and scrub jungle, railway cuttings and embankments, lateritic plateaus, saline and brackish wetlands with large areas of sedges and/or sea holly, dykes between saltpans, edges of freshwater ponds and tanks, stubble fields with a scattering of bushes etc. **Favoured sites**: Terakol (Pernem); Anjuna, Tivim-Damedem, Baga creek and fields*, Arpora-Parra plateau, Guirim, Calangute, Candolim, Pilerne (Bardez); Chorao, Divar, Cumbarjua canal, Ciba-Geigy, Carambolim, Ribandar, Santa Cruz creek, Dona Paula plateau, Neura wetlands*** (Tiswadi); Velsao (Marmagoa); Shiroda wetlands (Ponda); Mollem, Collem (Sanguem). **Distribution**: This species is distributed throughout much of coastal North and Central Goa, south to a line from Velsao to Shiroda to Collem. This leaves out most of Salcete *taluka* and all of Quepem and Canacona. **Population**: Generally seen in pairs; typical day counts range from two to eight birds and can go up to 25+ in suitable habitats. **Breeding status**: In the coastal belt, incubation was noted in mid-August and mid-November, nest building

in mid-October, indicating two consecutive breeding seasons. **Seasonal status**: Encountered throughout the year in more or less constant numbers. The distinctive 'song' is heard from July to October and a kind of 'sub-song' occasionally during the period from April to June.

ZOSTEROPIDAE
White-eyes

(1933-6) **Oriental White-eye** ***Zosterops palpebrosus*** (Temminck)
(Indian White-eye, White-eye)

First reported by Rane (1984a) who observed it at Bondla WS on one of his Goa trips, which took place from 18th – 24th May 1981, 6th – 10th April and 16th – 22nd June 1982. **Status**: Uncertain. Probably a casual visitor from adjacent areas beyond the crest of the Western Ghats. The author's altogether 12 sightings are all from border areas along the ridge of the Ghats, at altitudes above 450 metres. The three records in the Bondla WS, by Rane (1984a) and Holt (1996a, 1999), coming from altitudes of between 70 and 200 metres, seem exceptional. Three visiting British birders claim to have recorded the Oriental White-eye at Baga, Saligao and Sinquerim, sites in the coastal lowlands. **Habitat**: Broken, dense evergreen forest and *sholas*. **Population**: This highly gregarious bird is occasionally seen in pairs, but mostly in small flocks of 5-10 birds. **Seasonal status**: Not yet recorded during the period from July to November. On the top of the Ghats, this species appears to be commonest between mid-April and early June.

SYLVIIDAE

ACROCEPHALINAE
Warblers

(1545) **Grasshopper Warbler** ***Locustella naevia*** (Boddaert)
(European Grasshopper warbler, Common Grasshopper Warbler)

Status: A very rare (and possibly much overlooked) winter visitor to the river basins and the base of the Western Ghats. **Sightings**: Dennis (1999) observed a single bird in scrub at Tambdi Surla, between 4th and 6th December 1999. Frost (pers. comm.) saw singles in saline sedges at a wetland at Tivim-Damedem, on 31st December 2000 and 27th January 2002.

(1542-3) **Rusty-rumped Warbler** ***Locustella certhiola*** (Pallas)

(Pallas's Warbler, Pallas's Grasshopper Warbler)

Status: Possibly a rare, locally distributed and no doubt very unobtrusive winter visitor to the river basins. **Sightings**: Between one and three birds were reported by Jännes (1998) on 2nd and 7th December 1998 and Holt (1999) on 10th November 1999 in an area of tidal salt marsh at Tikanem on Chorao Island.

(1557-8) **Paddyfield Warbler** ***Acrocephalus agricola*** (Jerdon)

First recorded on 5th November 1983, at the Baga creek. **Status**: An uncommon, locally distributed winter visitor to the coastal belt and river basins. **Habitat**: Invariably found near water. Preferred localities are mangrove-lined banks of tidal creeks and rivers, bush-lined *bundhs* between saltpans, patches of sea holly, sedges and reed-beds in saline, brackish and freshwater marshes, wet grasslands and stands of *pandanus* at streams and rivers in riverine and semi-evergreen forest. **Sites**: Parxem-Agarwaddo wetlands** (Pernem); Chapora, Baga creek and paddy-fields**, Candolim marsh, Tivim-Damedem (Bardez); Naroa (Bicholim); Chorao-Tikanem, Divar, Ciba-Geigy, Carambolim lake and grassland, Cumbarjua canal, Neura wetlands, Panaji saltpans**, Batim (Tiswadi); Velsao (Marmagoa); Shiroda wetlands (Ponda); Chauri, Cotigao WS (Canacona). **Population**: This bird is encountered singly or in twos. **Seasonal status**: Autumn arrival is around mid-October (earliest record: 23rd September), departure follows a modest spring passage migration at the end of March (latest record: 15th April). There is a single unseasonal record of a bird at the Ciba-Geigy ponds, on 22nd June 1996.

(1556) **Blyth's Reed Warbler** ***Acrocephalus dumetorum*** Blyth

First reported by Saha and Dasgupta (1992), who collected the first of four specimens at Poinguinim, on 23rd December 1968 during one of their many collecting trips to Goa for the Zoological Survey of India. **Status**: A very common and widespread winter visitor throughout the state, from the coast to the ridge of the Western Ghats. **Habitat**: This bird, despite its name much less bound to the neighbourhood of water than the Paddyfield Warbler, occurs in a huge array of habitats – from mangrove swamp and riverine scrub to gardens, orchards, scrub, light woodland to densest wet evergreen forest. **Population**: Invariably occurs singly. Typical day counts range from three to thirty birds. **Seasonal status**: Autumn influx takes place at the end of October (earliest record: 21st). Departure is preceded by a low-intensity spring passage at the end of March (latest record: 21st April). **Miscellaneous**: A kind of sub-song can be heard for a short while after arrival, up to mid-November, and shortly before departure, from mid-March onwards.

(1550-2) **Clamorous Reed Warbler** ***Acrocephalus stentoreus*** (Hemprich & Ehrenberg)

(Indian Great Reed Warbler)

First recorded at the Velsao marsh on 12th January 1983. **Status**: An uncommon to fairly common winter visitor to the coastal region, including the river basins; rare in the midlands. **Habitat**: Strongly bound to the vicinity of water – saline, brackish or fresh, this reed warbler is found in mangrove swamps, reedbeds, sedges, bush-lined *bundhs* between saltpans and paddy-fields, margins of pools, tanks and lakes etc. **Sites**: Parxem-Agarwaddo marshes (Pernem); Arpora creek, Tivim-Damedem, Baga marsh and creek, Candolim marsh, Sinquerim creek, Nerul (Bardez); Mayem lake (Bicholim); Salim Ali Bird Sanctuary, Chorao-Tikanem, Divar, Cumbarjua canal, Ciba-Geigy, Carambolim lake, Merces tank, Panaji saltpans, Santa Cruz paddy-fields (Tiswadi); Velsao marsh (Marmagoa); Shiroda wetlands (Ponda); Rachol, Chandor marshes (Salcete). **Distribution**: Not yet recorded south of a parallel passing through Chandor, which excludes most of Salcete and Sanguem and all of Quepem and Canacona *talukas*. **Population**: This bird keeps always solitary. Day counts never exceeded three individuals. **Seasonal status**: Records span the period between 10th October and 5th April.

(1549) **Thick-billed Warbler** ***Acrocephalus aedon*** (Pallas)

(*Phragmaticola aedon*)

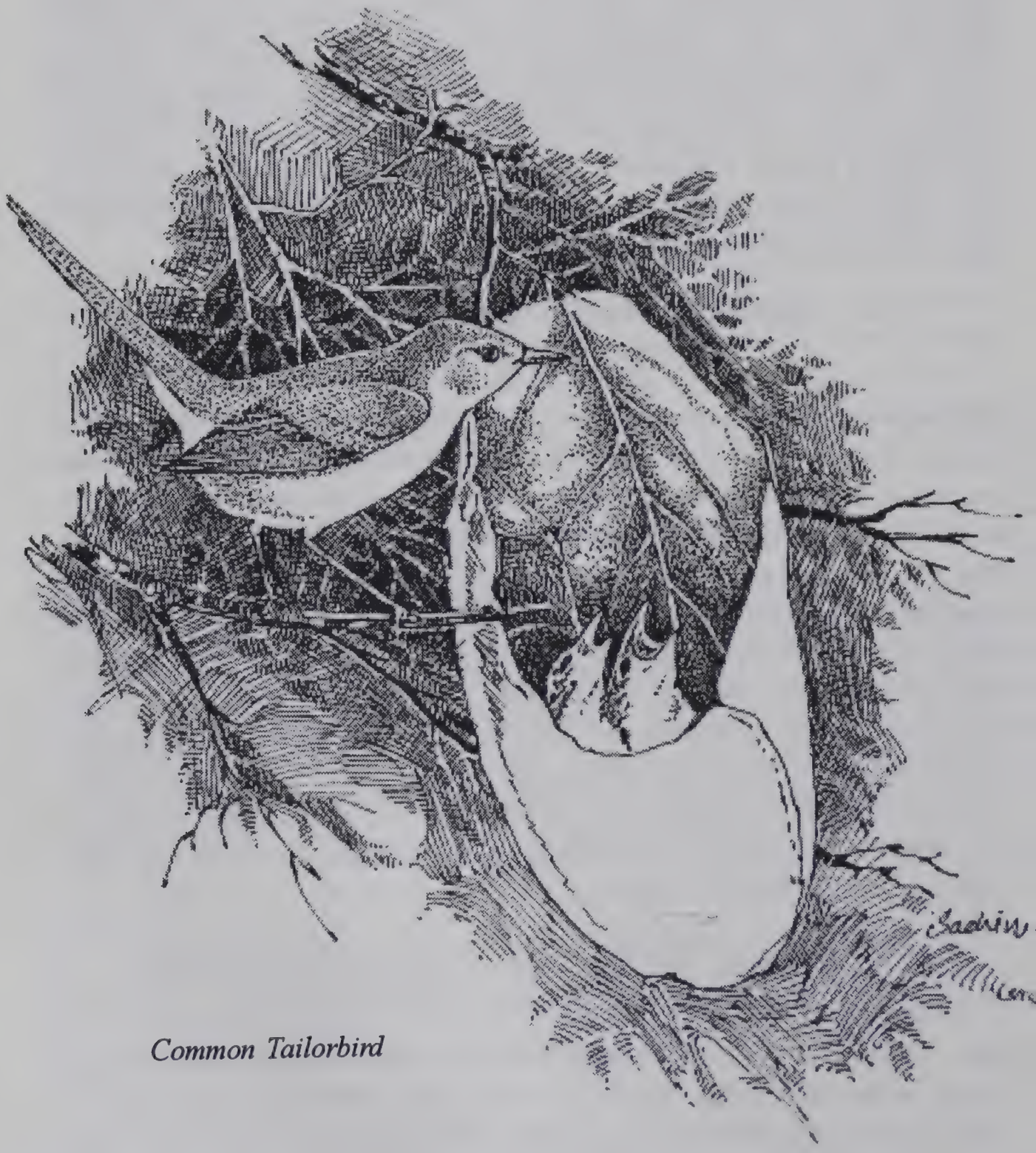
First reported by Saha and Dasgupta (1992), who collected a specimen near a stream at Mollem, on 20th February 1978 and identified it as belonging to the nominate race *A. a. aedon*. **Status**: A scarce winter visitor to the coastal belt and river basins. Ali and Ripley (1973) questioned the authenticity of its occurrence in Goa. Saha and Dasgupta (1992) rated this species as scarce in Goa. The author has altogether 20 sightings, covering the years from 1985 to 99. **Habitat**: Prefers bushes lining freshwater streams, paddy-fields and tidal creeks, patches of sea holly, bush-lined *bundhs* between saltpans, reed beds etc. Occasionally found in gardens, foraging in the crowns of coconut palms or going for flower nectar in trees. **Sites**: Siolim-Gudem, Siolim-Marna, Anjuna, Arpora creek, Baga creek (Bardez); Divar, Carambolim wetlands (Tiswadi); near Mollem (Sanguem); Corgal paddy-fields in the Cotigao WS (Canacona). **Seasonal status**: All records fall into the period between 14th November and 16th April.

(1562-3) **Booted Warbler** ***Hippolais caligata*** (Lichtenstein)

(Booted Tree Warbler, Sykes's Warbler, *H. rama*)

First recorded on 29th October 1985, when two birds were observed and heard singing, at the Nagoa valley. **Status**: The status of this warbler is uncertain due to it being 'regularly misidentified and probably equally frequently overlooked' (Holt,

pers. comm. 2000). Probably a scarce to locally uncommon, thinly but widely distributed winter visitor to the coastal belt, river basins and some areas in the midlands and at the foot of the Western Ghats and their outlying hills; also occurs on the top of the Ghats. **Habitat**: Scrub jungle, mangrove swamps, bushes and trees on the edges of ponds and tanks, patches of remnant semi-evergreen woodland, grasslands with a sprinkling of bushes etc. **Sites**: Baga hill, Nagoa valley, Pilerne pond, Fort Aguada (Bardez); Surla (Sattari); Mayem lake (Bicholim); Chorao-Tikanem, Chorao-Madel, Carambolim grassland, Dona Paula (Tiswadi); Bondla WS (Ponda); Tambdi Surla, Mollem, Collem, Bhagwan Mahavir WS (Sanguem); Majorda (Salcete); Cotigao WS (Canacona). **Seasonal status**: Sightings cover the period between 22nd October and 21st April.



Common Tailorbird

(1535-9) **Common Tailorbird *Orthotomus sutorius*** (Pennant)

(Long-tailed Tailorbird)

First reported by Grubh and Ali (1976), who noted it at Mollem, Canacona and elsewhere during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A very common and widespread breeding resident that is distributed from the coast to the base and lower slopes of the Western Ghats and their outlying hills. **Habitat**: Encountered in a wide variety of habitats, like gardens, orchards, margins of cultivation, scrub jungle, edges of forest, moist deciduous and semi-evergreen forest etc. **Population**: Almost always met with singly or in pairs. Day counts of between two and eight birds are the norm. **Breeding status**: There are at least two breeding seasons, one pre-monsoon in April-May, the other at the tail end of the monsoon, in August-September, and possibly a third in November-December. **Seasonal status**: Recorded throughout the year with insignificant fluctuations.

(1581) **Sulphur-bellied Warbler *Phylloscopus griseolus*** Blyth

(Olivaceous Leaf Warbler)

First reported by Grubh and Ali (1976), who collected a specimen at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: Uncertain. Goa lies quite well to the south of the species' normal wintering range and despite numerous reports of the species in the region it is probably no more than an occasional or rare winter visitor to Goa (Holt *in litt.* 2000). **Habitat**: Forest and light woods on steep and rocky scarps in the Western Ghats and moist deciduous forest at the foot of the Ghats. **Sightings**: Watts (1987) saw two birds at the Bondla WS on 7th March 1987; Willoughby (1993) observed two birds at Baga on 17th March 1993. The author recorded single birds of the species on four dates in the years 1985-1987. Three of the sightings were made at altitudes between 150-300 metres along the Braganza Ghat in the Bhagwan Mahavir WS and one at Tambdi Surla, at the foot of the Ghats. **Seasonal status**: Records span the period from 10th November to 17th March. **First recorded** by Grubh and Ali (1976) who collected a specimen at Canacona, during their ornithological survey of Goa from 27th November to 12th December 1972, but misidentified it as Tytler's Leaf Warbler *Phylloscopus tytleri*. This was pointed out by Price (1980). Saha and Dasgupta (1992) collected a specimen at Canacona, on 30th March 1973, during one of their collecting trips to Goa for the Zoological Survey of India. They identified it as belonging to the nominate race *P. t. trochiloides*. **Status**: An abundant winter visitor throughout the state, from the coast to the crest of the Western Ghats. Between mid-September and mid-April, this is probably Goa's most common bird. **Habitat**: Found in virtually all woodland localities. **Population**: See under 'Subspecific status'. **Seasonal status**: Autumn influx starts usually in late September (earliest record: 6th); departure is over in late April, but can drag on into early May (latest record: 7th). **Subspecific status**:

Holt (*in litt.* 2000) observes: 'Two forms occur in the state – nominate *P. t. trochiloides* and the Central Asian breeding *P. t. nitidus*. The latter is sometimes elevated to species status – as 'Green Warbler *P. nitidus*'. Currently rather few observers have distinguished between the forms and there's rather little information, other than [my] observations, to go on. Both are normally solitary, though several individuals may, on occasion, be found in the same tree. *P. t. trochiloides* is much the scarcer of the two throughout the state. This is particularly so in the lowland coastal belt where low single-figure day-counts are the rule. (Counts in excess of five individuals are rare here). Uncommon in the coastal belt, it occurs with increasing regularity away from the coastal plain, this tendency becoming more and more marked with increasing altitude in the Western Ghats. By the time you reach the inland reserves nominate *trochiloides* is common and up to 15 birds have been counted in a day at Bondla WS, with slightly lesser numbers at both Bhagwan Mahavir WS and Cotigao WS. *P. t. nitidus* also occurs almost throughout the state, from the coast to at least the middle elevations of the Western Ghats (and probably all the way to the crests). Abundant in the plains where day counts in excess of 20 birds are common, and the form outnumbers nominate *trochiloides* here by about 4:1 or 5:1. *Nitidus* remains common away from the plains and is still frequent in the lower Ghats and there are several counts of between 20 and 28 birds at Bondla WS for example. However the nominate form is also relatively more common here and the ratio of *nitidus* to nominate *trochiloides* drops to about 3:2. (On one date, the 18th November 1998, [I] even noted more *trochiloides* than *nitidus*)!'

(1601) **Large-billed Leaf Warbler *Phylloscopus magnirostris*** Blyth

First recorded at the top of Dudhsagar waterfalls on 18th March 1988. **Status**: An uncommon to scarce winter visitor to the Western Ghats and their outlying hills, from the base to the top. There is a single record from the midlands. **Habitat**: Riverine, mixed, semi-evergreen and not too dense evergreen forest. **Sites**: Mayem lake, Bondla WS***, Durgini, Tambdi Surla, Mollem, Collem, Bhagwan Mahavir WS**, Neturlim, Cotigao WS*. **Observers**: Carthy (1998), Hill (1995), Holt (1996b, 1997, 1998b, 1999), Lassey (2000), Tunturi (1998), Vermeulen (2000), Willoughby (1993, 1996), Wilson (1997) and the author. **Population**: Typically encountered singly or in twos, though loose groups of up to a dozen are occasionally seen. Seasonal **status**: Sightings cover the period from 5th November to 18th March.

(1606) **Western Crowned Warbler *Phylloscopus occipitalis*** (Blyth)

(Large Crowned Leaf Warbler)

First reported by Grubh and Ali (1976), who collected four specimens of the nominate *P. o. occipitalis* at Mollem and Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A fairly common, locally common winter visitor to the Western Ghats and their outlying hills, from the base to

the ridge, and, occasionally, to ravines and gullies on the scarp of midland plateaus bordering onto the coastal belt and to coastal headlands. **Habitat**: Mixed and semi-evergreen woodland, moist deciduous, riverine, semi-evergreen and dense wet evergreen forest. **Ghat sites**: Surla, Bondla WS*, Tambdi Surla, Backwoods Camp, Bhagwan Mahavir WS *** and Cotigao WS**. **Midland sites**: Mayem lake. **Coastal sites**: Nagoa valley, Saligao spring, Cabo de Rama. **Population**: 'The only species of *Phylloscopus* warbler to form flocks in Goa, Western Crowned Warbler not infrequently occurs in parties of up to a dozen individuals.' (Holt *in litt.* 2000). Flocks of up to 25 birds have been observed. This warbler is often the main constituent of mixed-species feeding parties in forest. **Seasonal status**: Sightings span the period between 22nd October and 22nd April.

GARRULACINAE

Laughingthrushes

(1287) **Wynaad Laughingthrush** ***Garrulax delesserti*** (Jerdon)

(Rufous-vented Laughingthrush, *G. gularis*)

First recorded by the author at the top of Dudhsagar waterfalls, on 2nd January 1983. **Status**: Uncertain. This Western Ghats endemic is probably an uncommon, locally or seasonally fairly common resident in the border areas along the crest of the Western Ghats, but possibly restricted to the region between the top of Dudhsagar waterfalls and Castle Rock (Uttar Kanara, Karnataka). Writing about the, then, North Kanara district of Karnataka, Davidson (1898) reported: 'I have found it only in the extreme north-west portion of the district along the Goan frontier, from Castle Rock to Anshi, where it goes about in large flocks.' Grubh and Ali (1976), during their ornithological survey of Goa from 27th November to 12th December 1972, climbed Vagheri hill (792 metres) 'in order to establish whether or not the plant genus *Rubus* (brambles) and its symbiotic bird genus *Garrulax* (laughing thrushes) also occur in Goa as both do in the Kerala ranges a couple of hundred metres above this elevation.' Their search for the latter was unsuccessful. **Habitat**: Densest undergrowth in dense wet evergreen forest and *sholas*. **Sightings**: Frost and the author have 8 sight records, all from the area around the top of Dudhsagar waterfalls. **Population**: Invariably seen in flocks of between five and thirty birds. **Seasonal status**: Recorded in January, February, April, October and December. Occurrence during the southwest monsoon could not be established because the area is almost inaccessible during the rains.

SYLVIINAE
Babblers and *Sylvia* Warblers

(1152-9) **Puff-throated Babbler *Pellorneum ruficeps*** Swainson
(Spotted Babbler)

First reported by Grubh and Ali (1976), who collected three specimens of the nominate race at Mollem and also observed it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. Saha and Dasgupta (1992) ascribed the two specimens, taken by them in the Bhagwan Mahavir WS on 23rd February 1978, to the nominate *P. r. ruficeps*. **Status**: This unobtrusive bird that is heard much more often than seen is a fairly common and widespread breeding resident of all three regions, from just behind the seashore to the crest of the Western Ghats. **Habitat**: Preferred localities are overgrown ruins, undergrowth in gullies and ravines on the scarp of coastal and midland plateaus, bamboo clumps, open moist deciduous, semi-evergreen and even dense wet evergreen forest. **Population**: Normally occurs in pairs or small family parties. Day counts of 2-6 birds are typical. **Breeding status**: Incubation and nestlings were noted in July, collection of nest material in April. The two birds taken in February by Saha and Dasgupta (1992) had breeding gonads. **Seasonal status**: Recorded throughout the year in unchanging numbers and with near-constant frequency.

(1172-7) **Indian Scimitar Babbler *Pomatorhinus horsfieldii*** Sykes
(Travancore Scimitar-Babbler, Ceylon Scimitar-Babbler, *Pomatorhinus schisticeps*)

First reported by Grubh and Ali (1976), who observed it at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: This Indian subcontinent endemic is a scarce to uncommon, locally common resident of the entire Western Ghats strip and the outlying hills. It is scarce on the lower slopes, where it occurs down to about 70 metres, and commonest on the crest. There appears to exist a very small but obviously viable population at one place in coastal Pernem *taluka*. **Habitat**: Restricted to semi-evergreen and evergreen forest with dense undergrowth or bamboo clumps on the scarp of the Ghats and to densest wet evergreen forest and *sholas* on the top. **Sites and sightings**: Top of Dudhsagar waterfalls (common), Bondla WS (16 sightings), Bhagwan Mahavir WS (8), Surla (2). The five records by Holt (1998b) and Jännes (1998) from Mayem lake, in November-December 1998, are the only ones in the midland region and, possibly, just a chance encounter with a few roving birds. There is an exceptional sighting by Prasad (pers. comm. 2001) of a single bird in a ravine at Arambol, just a couple of hundred metres from the sea, on 15th January 2001. This sighting was confirmed when Frost, Manville and the author recorded a small flock of 5-7 birds in the same locality, on 29th Octo-

ber 2002. **Population**: Occurs singly, though more often in pairs and occasionally in small parties of up to five birds. Sometimes participates in mixed species forest feeding parties. **Seasonal status**: This species occurs most probably throughout the year, but has not yet been recorded in March and July.

(1219-23) **Tawny-bellied Babbler** ***Dumetia hyperythra*** (Franklin)

(Rufous-bellied Babbler, White-throated Babbler)

First recorded by the author on 18th January 1981, in the Nagoa valley. **Status**: An Indian subcontinent endemic, this species is a scarce to uncommon, probably breeding resident in the coastal belt; rare in the midland region. **Habitat**: Scrub jungle and dense undergrowth in woodlands are among the favoured haunts of this babbler. **Favourite sites**: Nagoa valley (18 sightings), Baga ridge (14), Sinquerim (4), Velsao (2). **Other sites** (single sightings): Terakol, Arambol (Pernem); Saligao spring, Fort Aguada (Bardez); Mayem lake (Bicholim); Dona Paula (Tiswadi); Mobor (Salcete); Betul (Quepem). **Population**: Always encountered in 'sisterhoods' of between two and a dozen individuals. **Breeding status**: A family party with three fledglings was seen by Frost (pers. comm.) on 22nd June 2000 at the Nagoa valley. **Seasonal status**: Recorded in all months. See under 'Subspecific status'. **Subspecific status**: The subspecies *D. h. albogularis* is certainly predominant in the state though baffling intergrades with both *abuensis* and *hyperythra* have been observed, indicating a certain degree of local movement.

(1224-7) **Dark-fronted Babbler** ***Rhopocichla atriceps*** (Jerdon)

(Black-headed Babbler, Black-fronted Babbler)

First reported by Grubh and Ali (1976), who collected three specimens at Mollem and Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. They identified them as the nominate subspecies *R. a. atriceps*. **Status**: This Indian subcontinent endemic is a fairly common, locally common breeding resident of the Western Ghats and some of their outlying hills, from the base to the crest; it tends to be uncommon on the higher slopes and the ridge. **Habitat**: This species is very partial to cane brakes and bamboo clumps in deep and dense riverine, semi-evergreen and wet evergreen forest. **Sites**: Surla, Vagheri hill, Pendral, Kodal (Sattari); Bondla WS (Ponda); Tambdi Surla, Bhagwan Mahavir WS, Neturlim (Sanguem); Cotigao WS (Canacona). **Population**: A very gregarious bird, it is invariably found in 'sisterhoods' of five to a dozen individuals. Day counts of between 10-40 individuals are normal. It is only occasionally seen in mixed species feeding flocks in forest. **Breeding status**: Feeding of a fledgling was observed in mid-January. **Seasonally**: Present throughout the year, but in slightly smaller numbers during April-May.

(1230-2) **Yellow-eyed Babbler** ***Chrysomma sinense*** (Gmelin)

First recorded by the author at Terakol, on 23rd January 1982. **Status**: A scarce, very locally and patchily distributed resident in the coastal belt of North Goa; a single record exists from the midland region. **Habitat**: Apparently restricted to brush, scrub and bushes on lateritic coastal and, in one instance, midland plateaus. **Sites and sightings**: Terakol plateau (17 sightings); Dona Paula plateau (5) and at Goa Meat Complex near Usgao (1). **Observers**: Holt (1999), Lassey (1999), Lynes (1999), Manners (*fide* Holt, *in litt.* 2000), Shyama (1995) and the author. **Population**: Six birds were observed near Usgao and up to six at Terakol. **Seasonal status**: This species is possibly a 'monsoon fugitive' since it was not yet recorded in June, July and August.

(1259-60) **Rufous Babbler** ***Turdoides subrufus*** (Jerdon)

First reported by Grubh and Ali (1976), who collected two specimens of the nominate *T. s. subrufus* at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: This secretive but vociferous southwest Indian endemic is a scarce and locally distributed breeding resident of the Western Ghats strip from about 150 metres upwards; fairly common at some places on the top of the Ghats. **Habitat**: Dense undergrowth on margins of evergreen forest, cane brakes, bamboo clumps and *sholas*. **Sites and sightings**: Bhagwan Mahavir WS (7 sightings), top of Dudhsagar waterfalls (4) and Surla (3). **Observers**: Sutton (1997) and the author. **Population**: This gregarious bird is always found in 'sisterhoods' of about five individuals. **Breeding status**: Activity at nest was observed on 30th March 1989, at Sonaulim, in the Bhagwan Mahavir WS. **Seasonal status**: Recorded in all months except May, August and October.

(1261-5) **Jungle Babbler** ***Turdoides striatus*** (Dumont)

(White-headed Jungle Babbler)

First reported by Grubh and Ali (1976), who collected two specimens at Mollem and also observed it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. They ascribed them to the subspecies *T. s. somervillei*. **Status**: This subcontinent endemic is a widespread and common, locally very common resident of all three zones, from the coast to the ridge of the Western Ghats; absent only from the middle and upper slopes of the Ghats. **Habitat**: Found in a variety of often secondary habitats such as gardens, village outskirts, scrub jungle and margins of cultivation, also occurs on edges of forest, in open woodlands, not too dense riverine forest and *shola* country. **Population**: Typical day counts are of between ten and thirty birds. The fact that this gregarious babbler is almost invariably encountered in excitable, noisy groups of between five and a dozen birds gave rise to its common Hindi name *satbhai* (= 'seven brothers', wrongly

translated into English as 'seven sisters') and to the expression 'sisterhood' as a collective noun for any group or flock of babblers. **Breeding status**: Despite being such a familiar and conspicuous species, its breeding in Goa has not yet been conclusively established, though Frost (pers. comm.) reported a family party with two fledglings on 21st May 2001 in the Nagoa valley. **Seasonal status**: Recorded throughout the year. At least a part of the population appears to turn nomadic during the monsoon months June, July and August.

(1389-91) **Brown-cheeked Fulvetta** ***Alcippe poioicephala*** (Jerdon)
(Quaker Babbler)

First reported by Grubh and Ali (1976), who collected five specimens of the nominate *A. p. poioicephala* at Mollem, Canacona and Valpoi during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A widespread and fairly common, locally common resident and apparently also a local migrant that is found in all zones, from the coast to the crest of the Western Ghats. **Habitat**: Being a bird of the middle canopy, this babbler favours woodlands with at least a scattering of tall or tallish trees. **Population**: Rarely seen singly or in pairs. 'Sisterhoods' are common and consist of between three and thirty individuals. Day counts range between ten and fifty birds. This species is a frequent participant in mixed species forest feeding flocks. **Breeding status**: Though highly likely, breeding of this species in Goa has not yet been conclusively established. **Seasonal status**: Throughout the year, highly mobile roving bands of this babbler may turn up in any well-wooded locality and be gone in a couple of hours. This nomadism appears to be independent from the seasons.

(1567-8) **Lesser Whitethroat** ***Sylvia curruca*** (Linn.)
(Hume's Lesser Whitethroat, Hume's Whitethroat, *Sylvia althaea*, Small Whitethroat, Desert Whitethroat, Desert Lesser Whitethroat, *Sylvia minula*)

First reported by Rane (1984a), who observed it at Bondla WS during one of his trips to Goa, which took place from 18th – 24th May 1981, 6th – 10th April and 16th – 22nd June 1982. **Status**: Uncertain. Probably a scarce winter visitor to all three regions. **Favoured sites**: Fort Aguada (five sightings) and Dona Paula (3). **Other sites** (single sightings): Anjuna, Baga, Nagoa valley, Saligao, (Bardez); Mayem fields (Bicholim); Bondla WS (Ponda); Bhagwan Mahavir WS (Sanguem); Majorda (Salcete). **Observers**: Arnold (1997), Chadwick (1998), Duffield (2000), Griggs (1996), C. Harris (1998), Holt (1996a, 1998b), Jännes (1997, 1998), Lassey (1999), Sykes (1999), Todd (2000), Vermeulen (2000), Watts (1987) and the author. **Population**: All records were of singles except one, which was of two birds. **Seasonal status**: Records span the period between 29th October and 13th April.

ALAUDIDAE
Larks

(872) **Singing Bushlark *Mirafra cantillans*** Blyth

Status: Probably a stray. **Sighting**: A single specimen was observed by the author on the stony and grassy, lateritic, coastal plateau surrounding the ZAC reservoir at Sancoale, on 29th September 1999.

(878) **Ashy-crowned Sparrow Lark *Eremopterix grisea*** (Scopoli)
(Ashy-crowned Finch-Lark)

First recorded at the Dabolim plateau, on 31st December 1980. **Status**: This Indian subcontinent endemic is a locally fairly common, monsoon evading dry season visitor to the lowlands of the coastal belt and river basins that is also found on coastal plateaus and headlands. **Habitat**: Favoured areas are grasslands and stubble fields, especially when they are in the vicinity of saline or brackish wetlands, also stony lateritic plateaus and headlands. During April-May, this lark is often seen bathing and drinking at the edges of the few remaining ponds. **Sites**: Terakol plateau, Arambol, Parxem-Agarwaddo, Tuem-Arabo (Pernem); Anjuna, Baga fields*, Guirim, Pilerne, Pomburpa plateau (Bardez); Chorao, Divar-Navelim***, Carambolim grasslands, Neura wetlands**, Pilar pond, Dona Paula (Tiswadi); Dabolim, ZAC reservoir (Marmagoa); Canaguinim plateau, Cabo de Rama (Canacona). **Population**: Usually encountered in pairs or small groups of up to six individuals. Larger flocks of up to 25 birds can be seen during autumn and spring passage. **Seasonal status**: This lark evades the southwest monsoon by departing in

Ashy-crowned Sparrow Lark

late April and early May (latest record: 31st) and returning in late September to early October (earliest record: 23rd September). There are signs of a modest and probably local bi-annual passage migration at the time of departure and arrival.

(882-3) **Rufous-tailed Lark** ***Ammomanes phoenicurus*** (Franklin)

(Rufous-tailed Finch-Lark, Rufous-tailed Desert Lark)

First reported by Holt (1996a), who observed at least six birds at the grassland near Carambolim on 11th January 1996. **Status**: Very similar to the Ashy-crowned Sparrow Lark, this subcontinent endemic is found as an uncommon to scarce, capriciously distributed, monsoon evading dry season visitor in the lowlands of the river basins that was only once recorded at a midland site. **Habitat**: Almost exclusively encountered on grassland and stubble fields adjoining saline or brackish wetlands. Towards the end of the dry season, in April-May, when freshwater is scarce, pond's margins are used for drinking and bathing. **Sites and sightings**: Neura wetlands (17 sightings), Pilar pond (6), Chorao (4), Carambolim grassland (3), Divar-Navelim (3), Shiroda wetlands (1), plateau at Goa Meat Complex (1). **Population**: In most years about six birds are present at the Neura site. During four winters, Holt (pers. comm. 2000) found up to eight individuals almost reliably present at the Carambolim site. **Seasonal status**: Recorded between 17th September and 4th June; apparently absent during the southwest monsoon.

(885-6) **Greater Short-toed Lark** ***Calandrella brachydactyla*** (Leisler)

(Short-toed Lark, *Calandrella cinerea*)

First reported by Grubh and Ali (1976) who encountered 'flocks' at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A common, in some years abundant winter visitor to the coastal belt and river basins; rare in the midlands and at the foot of the Western Ghats. **Habitat**: This species favours extensive grasslands and areas of dry saline sedges as well as stubble fields and wasteland. Frequently found on grassy and stony lateritic plateaus and ridges. **Sites**: Arambol (Pernem); Anjuna, Baga fields*, Guirim**, Candolim fields, Pilerne, Tivim-Damedem, Fort Aguada (Bardez); Chorao-Madel, Divar**, Carambolim grasslands, Neura wetlands***, Santa Cruz creek, Dona Paula ridge (Tiswadi); Goa Meat Complex (Ponda); ZAC reservoir** (Marmagoa); between Mollem and Collem (Sanguem). **Population**: Rarely seen in groups of less than ten individuals. In October, during autumn passage, and in December-January, when the wintering population is at its peak, loose nomadic flocks of 300-500 birds are fairly common and, in some years, flocks of several thousand birds can be seen. Wintering populations fluctuate to a great degree from year to year. **Seasonal status**: Influx usually starts at the beginning of October (earliest record: 24th September), followed by a massive passage migration throughout the month. The wintering population, after a peak in January declines until late March when a modest spring passage revives its numbers; the last birds leave by early April (latest report: 13th).

(901) **Malabar Lark** ***Galerida malabarica*** (Scopoli)

(Malabar Crested Lark)

First reported by Grubh and Ali (1976), who collected a specimen at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: This Indian endemic, a monsoon-evading breeding dry season visitor or 'almost resident', is widespread and fairly common, locally and seasonally very common throughout the coastal belt and river basins. It is scarcer in the midland region and at the foot of the Western Ghats. **Habitat**: Found in beach vegetation just above the highwater line, on wasteland, arid and damp grassland, pastures, stubble fields, expanses of dry and saline sedges, grassy lateritic plateaus and ridges, larger clearings in foothill forest etc. **Population**: Generally encountered singly or in pairs. A single grassland site can contain up to over 30 birds. Typical day counts range from two to ten birds. **Breeding season**: Incubation was noted during the first days of November, at a coastal plateau. The song is heard from August to January. **Seasonal status**: Monsoon exodus begins in April and by late May most birds have left (latest record: 7th June). Return migration sets in at the end of August, in some years as early as the last days of July (earliest record: 30th July), followed by an autumn passage migration throughout September, when up to a hundred birds were counted at single sites.

(902) **Sykes's Lark** ***Galerida deva*** (Sykes)

(Sykes's Crested Lark, Tawny Lark)

Status: Uncertain. Probably a rare irruptive visitor or vagrant in the coastal lowlands and river basins. **Sightings**: Two birds were observed by Frost and the author (1999b) at stubble fields beside the upper Arpora creek, on 4th December 1996. This was followed by several sightings over the next ten days at pastures east of Candolim, by Frost and Manville (pers. comm.). Marsh (1998) reported a single on 4th February 1998 and Spalding (1998) three birds on 18th February 1998, at the Carambolim grassland.

(904-9) **Oriental Skylark** ***Alauda gulgula*** Franklin

(Small Skylark, Eastern Skylark, Little Skylark)

First recorded on 18th February 1981 at the ZAC reservoir. **Status**: A widespread and fairly common, seasonally and locally very common resident of the coastal belt and river basins that is scarcer in the midlands and rare at the foot of the Western Ghats. **Habitat**: Grassland, pastures, stubble fields, wasteland, dry saline beds of sedges, grassy plateaus and ridges etc. **Favoured sites**: Divar-Navelim***, ZAC reservoir**, Neura wetlands*. **Unusual sites**: Meadows between Mollem and Collem, fields near Goa Meat Complex. **Population and seasonal status**: During the dry season, low single figure counts at a single site are the norm. In early June, about the

time the southwest monsoon usually starts, these larks begin to sing and numbers increase sharply and keep going up until by early August a population peak is reached with hundreds of birds being present at the same site. From there on numbers decline slowly until a sharp drop in early September brings the population down to pre-monsoon levels. The few remaining individuals continue to sing until mid-November. **Breeding status**: No signs of breeding have been noted.

NECTARINIIDAE
Flowerpeckers, Sunbirds and Spiderhunters

(1892-4) **Thick-billed Flowerpecker** ***Dicaeum agile*** (Tickell)

First reported by Grubh and Ali (1976), who observed it at Valpoi during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: An uncommon dry season breeding visitor at the lower and middle slopes (up to *ca.* 300 metres) of the Western Ghats, scarce in the midland region and coastal belt. **Habitat**: Found in scrub jungle and dry, moist deciduous and mixed forest. **Coastal sites**: Terakol (Pernem); Anjuna, Assagao, Baga ridge, Nagoa valley, Saligao spring (Bardez); Dona Paula (Tiswadi). **Midland sites**: Mayem (Bicholim); Candollem (Quepem). **Ghat sites**: Surla, near Valpoi (Sattari); Bondla WS (Ponda); Collem, Mollem, Bhagwan Mahavir WS (Sanguem); Cotigao WS (Canacona). **Population**: Almost always encountered singly though groups up to six birds have been observed. **Breeding status**: Activity at a nest on the slope of the Western Ghats, at an altitude of about 300 metres, was noted in mid-March. **Seasonal status**: Not yet recorded between 16th May and 25th September.

(1899-1900) **Pale-billed Flowerpecker** ***Dicaeum erythrorhynchos*** (Latham)

(Tickell's Flowerpecker)

First recorded on 20th July 1981 at Arpora. **Status**: A widespread and fairly common, locally common, and partly nomadic resident of all zones, from the coast to the foot of the Western Ghats; also found on the crest of the Ghats, absent from the slopes. **Habitat**: Very partial to mango groves where it is irresistibly drawn to the berries of the mistletoe-like *Loranthus*. Other habitats comprise gardens, scrub jungle, moist deciduous and semi-evergreen forest. **Population**: Typically encountered singly or in pairs. Day counts range between one and six birds. **Breeding status**: Breeding is suspected but not documented as yet. **Seasonal status**: Numbers drop sharply during the southwest monsoon, June to September.

(1901-3) **Plain Flowerpecker** ***Dicaeum concolor*** Jerdon

(Plain-coloured Flowerpecker)

First reported by Grubh and Ali (1976), who collected three specimens at Mollem and Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. A specimen collected by Saha and Dasgupta (1992) at Poinguinim, on 25th March 1973, was identified as belonging to the nominate *D. c. concolor*. **Status**: A breeding resident that is uncommon in the coastal belt, fairly common in the midlands and common in the Western Ghats, from the base to the crest. **Habitat**: Bush jungle and moist deciduous, semi-evergreen and evergreen forest. **Population**: Usually encountered singly. Day counts between one and six birds are the norm. **Breeding status**: Feeding of fledglings was observed by Frost (pers. comm.) in mid-March. Nest building was noted in April and September in the coastal belt and in April in the Western Ghats. **Seasonal status**: Encountered in unchanging numbers throughout the year.

(1907-8) **Purple-rumped Sunbird** ***Nectarinia zeylonica*** (Linn.)

First reported by Grubh and Ali (1976), who collected it at Canacona and also observed it at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. They ascribed the specimen to the subspecies *N. z. sola*. Saha and Dasgupta (1992) collected two specimens at Poinguinim, in March 1973 and February 1978, during their collecting trips to Goa for the Zoological Survey of India and identified them as *N. z. flaviventris*. **Status**: A very common or even abundant breeding resident that is widely distributed from the coast to the base of the Western Ghats and is scarce on the ridge of the Ghats. **Habitat**: This sunbird prefers village environs, gardens, hedgerows, scrub jungle, mangroves along tidal creeks, tracts of open woodland, forest edges, secondary forest and remnant semi-evergreen woodland. **Population**: Usually found singly or in pairs although several may congregate in a flowering tree. Day counts of between six and 20 birds are typical. Breeding **status**: Nest building and feeding of nestlings was noted in February (van der Dol 2000) and between early August and early October. Purple-rumped Sunbirds are in non-breeding plumage from mid-April to late June. **Seasonal status**: The population fluctuates often wildly and erratically within very short spans of time, without any seasonal pattern being discernible.

(1909) **Crimson-backed Sunbird** ***Nectarinia minima*** (Sykes)

(Small Sunbird)

First reported by Grubh and Ali (1976), who collected two specimens, one at Mollem and the other at Valpoi, they also observed a party of three at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: This south Indian endemic is a breeding resident that is uncommon

to locally and seasonally very common in the coastal belt, fairly common at a few sites in the midlands and very common to seasonally abundant in the Western Ghats and their outlying hills, from the base to the summit. **Habitat**: Favours moist deciduous, riverine, semi-evergreen and wet evergreen forest in the Ghats; in the coastal belt it is also found in patches of remnant semi-evergreen woodland and, occasionally, even in gardens. **Population**: Counts of up to 20 birds in a day are not unusual at the Bhagwan Mahavir WS and up to 200 have been estimated in a day at Bondla WS. For most of the year, this is the commonest and most numerous bird in the forests of the Western Ghats. **Breeding status**: Nest building was observed in late February, on the outskirts of Collem. Male birds are largely silent and wear eclipse plumage from April through July. **Seasonal status**: Present throughout the year though numbers drop sharply during the monsoon months, June to September.

Purple Sunbird

(1916-8) **Purple Sunbird** *Nectarinia asiatica* (Latham)

First reported by Grubh and Ali (1976), who collected a specimen of the nominate race *N. a. asiatica* at Mollem and also observed it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A fairly common breeding resident that is uncommon in coastal lowlands, fairly common in the midland region and locally common in the Western Ghats and their outlying hills, except on the upper and steeper slopes. **Habitat**: Gardens, scrub and bush jungle, open woodland, mixed, moist deciduous and not too dense semi-evergreen and evergreen forest. **Population**: Usually seen singly or in pairs. Day counts of between one and five birds are normal. **Breeding status**: Activity at nest was observed in mid-November at the foot of the Ghats and feeding of nestlings in mid-April on the crest of the Ghats. Non-breeding plumage was noted from April into October, partial breeding plumage in January, April-May and October-November while full breeding plumage is worn from November through March. The song is heard from August to March. **Seasonal status**: Present almost throughout the year in fairly constant numbers, but the population diminishes sharply during the peak of the southwest monsoon, in June-July.

(1911-2) **Loten's Sunbird** *Nectarinia lotenia* (Linn.)

(Long-billed Sunbird, Maroon-breasted Sunbird)

First reported by Grubh and Ali (1976), who collected a specimen at Mollem and also observed it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. They assigned the specimen to *N. l. hindustanica* by range. **Status**: This Indian subcontinent endemic is a breeding resident that is fairly common in the narrow strip where midland plateaus border onto the coastal belt and at the foot and lower slopes of the Western Ghats and their outlying hills; it is scarce in the coastal lowlands, the midlands and the top of the Ghats and absent from the upper slopes of the Ghats. **Habitat**: Well-wooded villages, bush-covered plateaus, patches of remnant semi-evergreen woodland in ravines and gullies on the scarp of plateaus, edges of forest clearings, moist and dry deciduous forest and cuttings in semi-evergreen and evergreen forest. **Sites**: Baga ridge, Nagoa valley, Tivim-Damedem, Sinquerim (Bardez); Surla, Sattrem (Sattari); Divar-Piedade, Carambolim Dadda-Dongrim, Dona Paula (Tiswadi); Mayem lake (Bicholim); Bondla WS*** (Ponda); Mollem, Bhagwan Mahavir WS, top of Dudhsagar waterfalls (Sanguem); Shristhal, Cotigao WS (Canacona). **Population**: Almost always seen singly, rarely in pairs. Typical day counts are in the region of one to three birds. **Breeding status**: Feeding of a fledgling was observed at the end of March, near Mollem. Breeding plumage is worn throughout the year with only a few birds in eclipse plumage in February-March and partial eclipse in evidence only in August. The song season extends from August into April. **Seasonal status**: Present throughout the year in numbers that fluctuate minimally, without any monsoon exodus being noticeable.

(1927-9a) **Crimson Sunbird** ***Aethopyga siparaja*** (Raffles)

(Scarlet-breasted Sunbird, Yellow-backed Sunbird)

First recorded on 4th February 1982 in the Nagoa valley. **Status**: The subspecies *A. s.* vigorsii is a very patchily distributed, uncommon, locally and seasonally fairly common resident mainly of the coastal belt of North Goa; also recorded at two sites in the midlands and at a single site on top of the Western Ghats. **Habitat**: This bird is met with almost exclusively in gardens where it is very partial to red-flowering plants. Occasionally it is also found in patches of remnant semi-evergreen woodland in ravines on the scarp of midland plateaus facing the coastal belt. **Coastal sites**: Terakol, Kiranpani, Morjim (Pernem); Siolim, Chapora, Anjuna, Baga, Baga ridge, Nagoa valley, Saligao spring, Tivim-Damedem, Fort Aguada (Bardez); Divar-Piedade (Tiswadi); Sancoale, Velsao (Marmagoa). **Midland sites**: Alorna (Pernem); Mayem lake (Bicholim). **Ghat sites**: Surla (Sattari). There is a historical record by Davidson (1898) who spotted a Crimson Sunbird from the train somewhere 'below Castle Rock', near the crest of the Ghats. **Observers**: Claydon (1993), Duffield (2000), Frost (pers. comm.), Holt (1997, 1998a, 1999), Ransdale (1998), Smithson (1996) and the author. **Distribution**: Not yet recorded south of a line from Velsao to Mayem. This excludes almost all of South Goa i.e. the *talukas* of Salcete, Sanguem, Quepem and Canacona. **Population**: Invariably encountered singly or in pairs. **Breeding status**: Breeding is suspected in May-June. **Seasonal status**: Present throughout the year in varying numbers. The relatively small wintering population is steadily increasing from late February onwards, presumably with the influx of nomadic and locally mobile birds, until a population peak is reached during the monsoon months, June through September. The population is lowest between early November and late February.

Little Spiderhunter ***Arachnothera longirostris*** (Latham)

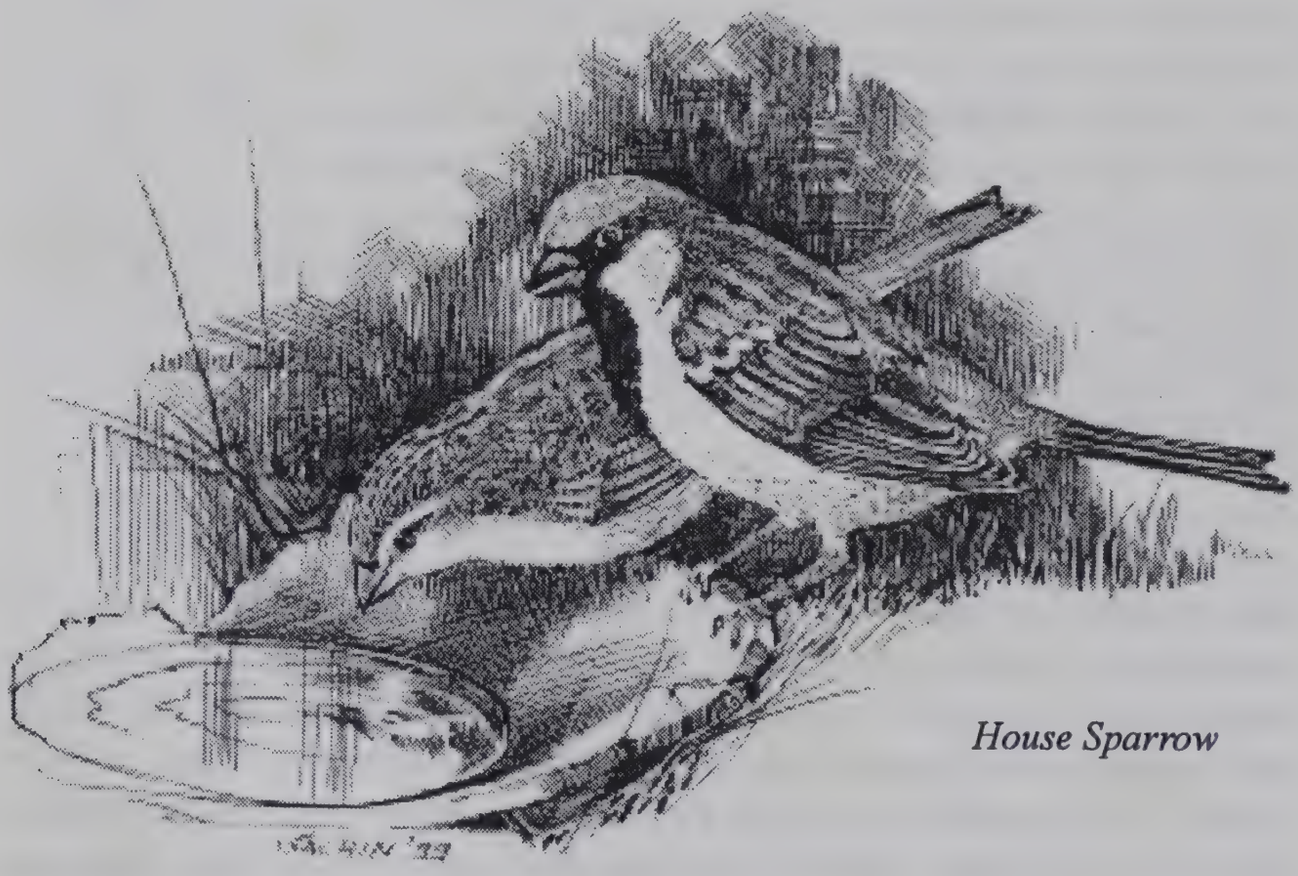
First reported by Saha and Dasgupta (1992), who collected a specimen of the nominate *A. l. longirostris* at Mollem, on 27th September 1977, during one of their collecting trips to Goa for the Zoological Survey of India. **Status**: A locally distributed, uncommon and generally unobtrusive resident of the Western Ghats and their outlying hills, from the base to the top, and of a couple of sites in the midland region; rare in the area where the midlands border on the coastal belt. **Habitat**: This bird is very much attracted to the flowers of 'wild' bananas on the steeper slopes of the Ghats as well as of cultivated bananas on the outskirts of villages and forest hamlets. Otherwise it favours mixed woodland, moist deciduous, riverine, semi-evergreen and evergreen forest and sugarcane plantations. Occasionally occurs in patches of remnant semi-evergreen woodland in ravines on the scarp of midland plateaus bordering onto the coastal strip. **Coastal sites**: Baga ridge, Nagoa valley, Saligao spring (Bardez). **Midland sites**: Mayem lake (Bicholim); Chandranath hill (Salcete). **Ghat sites**: Bondla WS** (Ponda); Tambdi Surla,

Mollem, Collem, Bhagwan Mahavir WS*** (Sanguem); Neturlim, Cotigao WS* (Canacona). **Observers**: Frost (pers. comm.), Hill (1997), Holt (1996a, 1996b, 1997, 1998a, 1998b, 1999), Jännes (1998), Lassey (2000), Tunturi (1998), van der Wielen (1998), Wilson (1997) and the author. **Seasonal status**: Recorded with almost constant frequency in all months except June. **Miscellaneous**: As late as 1977-78, Saha and Dasgupta (1992) '...found this Spiderhunter as a common bird of Goa. It was abundant at Mollem...' Either they were overoptimistic in their assessment or the situation has changed profoundly since then. At present, Little Spiderhunters are nowhere near 'abundant' at Mollem; at best, they are uncommon if not scarce.

PASSERIDAE

PASSERINAE

Sparrows and Snowfinches



House Sparrow

(1938-9a) **House Sparrow *Passer domesticus*** (Linn.)

(Indian Sparrow, *Passer indicus*)

First reported by Grubh and Ali (1976), who observed it at Panaji, where they found it 'common and abundant' during their ornithological survey of Goa from 27th November to 12th December 1972. Saha and Dasgupta (1992) collected a specimen at Poinguinim, on 19th March 1973, during one of their collecting trips for the Zoological Survey of India and assigned it to the subspecies *P. d. indicus*. **Status**: A

fairly common resident of urban areas and villages more or less throughout the state, from the coast to the foot of the Western Ghats. **Population**: Day counts of up to 30-50 birds are not uncommon. **Breeding status**: Breeding season is ill-defined and extends more or less throughout the year. **Seasonal status**: Present throughout the year. In June-July and November-December, this sparrow is much more in evidence than usual: flocks of 150-200 birds infest freshly sown paddy-fields and do moderate damage to agriculture. **Miscellaneous**: The House Sparrow began to 'colonize' coastal villages (e.g. Terakol, Anjuna) only from 1985 onwards.

(1948-9) **Chestnut-shouldered Petronia *Petronia xanthocollis*** (Burton)

(Yellow-throated Petronia, Yellow-throated Sparrow)

First reported by Grubh and Ali (1976), who observed it at Mollem and Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. Saha and Dasgupta (1992) collected 11 specimens at various places in Goa, between March 1973 and February 1978, during their collecting trips for the Zoological Survey of India, and assigned them all to the nominate *P. x. xanthocollis*. **Status**: A fairly common breeding dry season visitor that is widespread in all three zones, from the coast to the foot and lower slopes of the Western Ghats and their outlying hills, up to about 150 metres. **Habitat**: Favours areas of open grassland with scattered trees, open woodland, areas of scrub and hedges on the margins of cultivation, edges of forest clearings and, especially, dry and moist deciduous forest at the base of the Western Ghats. **Population**: Most sightings are of singles, pairs and parties of up to six individuals. Flocks of up to 150 individuals are fairly common at the foot of the Ghats and over a thousand birds collected at a night roost in large trees in the center of Collem village, on 9th November 1996. **Breeding status**: There are two distinct breeding seasons – April-May and November-December. **Seasonal status**: The whole population evades the southwest monsoon by a, presumably, local migration. Usually the exodus is complete in mid-May (latest record: 24th) and birds start reappearing in early October (earliest record: 26th August).

MOTACILLINAE
Wagtails and Pipits

(1874) **Forest Wagtail *Dendronanthus indicus*** (Gmelin)

(*Motacilla indicus*)

First reported by Grubh and Ali (1976), who collected a specimen at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: An uncommon winter visitor mainly to the base (up to *ca.* 150 metres) and the top of the Western Ghats and their outlying hills; also found on autumn passage in the coastal belt. **Habitat**: Dry streambeds and tracks in teak plantations

and moist deciduous and semi-evergreen forest at the foot and lower slopes of the Ghats are preferred haunts; occurs only occasionally in wet evergreen forest and in *sholas* on the top. **Ghat sites**: Bondla WS, Mollem, Bhagwan Mahaveer WS, top of Dudhsagar waterfalls, Cotigao WS. **Coastal sites**: Baga ridge, Nagoa valley, Dona Paula plateau, Carambolim grassland. **Population**: Birds are almost exclusively encountered singly. **Seasonal status**: The vanguard usually arrives in October (earliest record: 4th), followed by a protracted autumn passage migration throughout November that apparently leads at least partially over the coastal belt. The return movement in spring is less conspicuous and lasts into early April (latest record: 18th).

(1885-90) **White Wagtail *Motacilla alba*** Linn.

(Pied Wagtail)

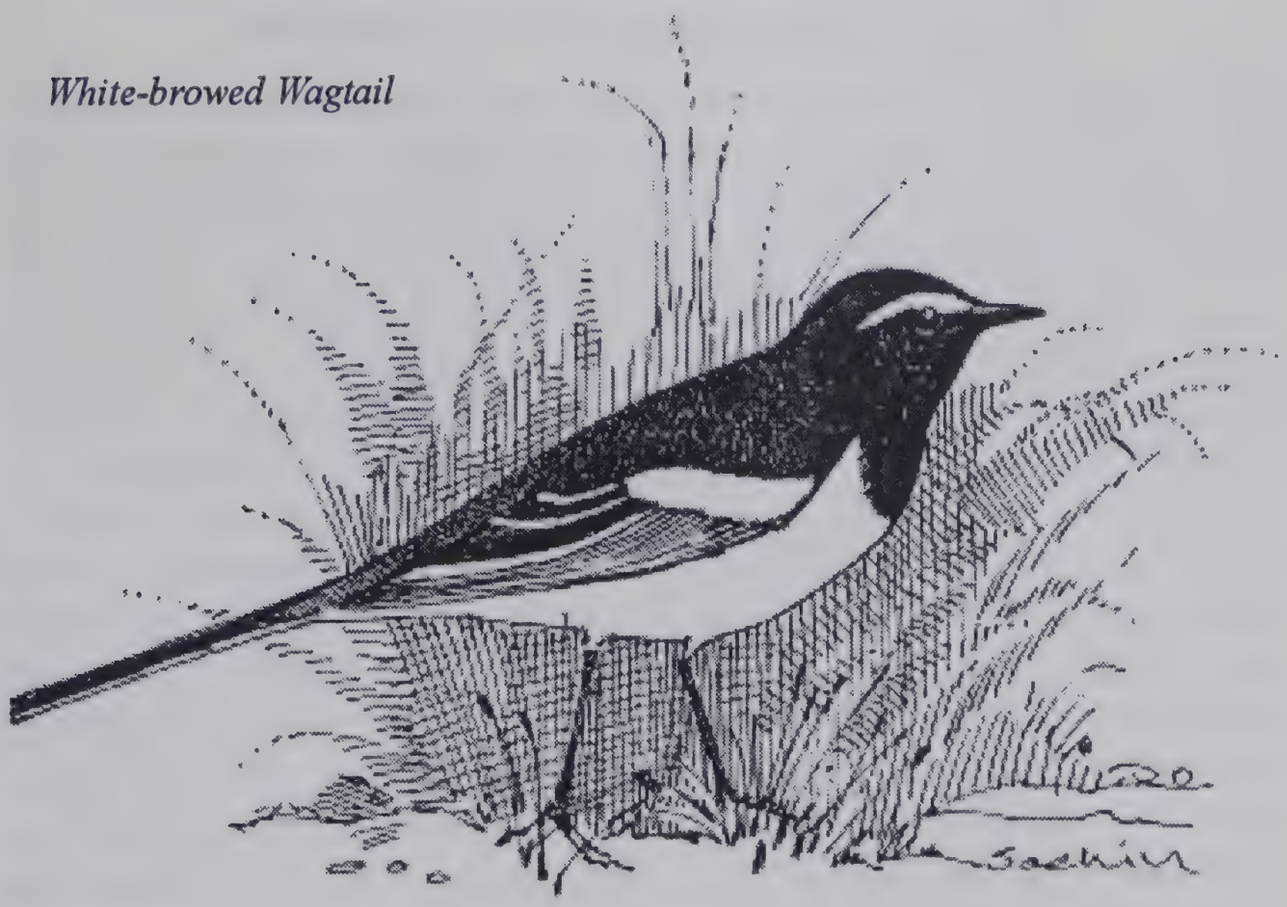
First recorded on 15th December 1983 at Kalay. **Status**: A rather scarce winter visitor to all three regions, from the seashore to the base, lower slopes (up to about 140 metres) and top of the Western Ghats. **Habitat**: This wagtail is found at beaches, stony lateritic plateaus, reservoirs and tanks. It has a penchant for irrigated rice-paddies at the foot of the Ghats. **Sites**: Morjim beach (Pernem); Siolim-Marna, Baga ridge, Baga fields (Bardez); Carambolim lake, Santa Cruz paddies, Dona Paula plateau (Tiswadi); Goa Meat Complex (Ponda); ZAC reservoir**, Velsao (Marmagoa); Kalay**, Mollem, Collem***, fields in Bhagwan Mahavir WS, top of Dudhsagar falls (Sanguem); Varca beach (Salcete); rice paddies in Cotigao WS (Canacona). **Population**: Most encounters are with single birds though parties of up to eight and flocks of over 40 birds have been observed in late November at *vaingonn* paddies at Kalay and at least 100 individuals in mid-November 1987 at the ZAC reservoir. **Seasonal status**: Birds are present between 10th October and, at least, 16th March. The large concentrations at Kalay and the ZAC reservoir in mid- and late November and several sightings of birds overflying unlikely coastal sites in a southerly direction are presumably indicative of continuing immigration and/or passage.

(1891) **White-browed Wagtail *Motacilla madaraspatensis*** Gmelin

(Large Pied Wagtail)

First reported by Grubh and Ali (1976), who observed it at Mapusa during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: This Indian subcontinent endemic is a widespread and fairly common to common breeding resident of all zones, from the coast to the base of the Western Ghats; also found on the crest of the Ghats. **Habitat**: Met with around habitation, on open grassland, in stubble fields, irrigated paddy-fields and near freshwater, brackish but rarely saline water bodies. **Population**: Rarely found singly, usually occurs paired and occasionally in moderate-sized parties. Day counts range between two and 15 birds. A roost became established in the late 1990s on newly sunk pilings for the road bridge across the river Chapora at Siolim. On 4th November 1999, 37 birds

White-browed Wagtail



were counted at this roost. Birds arrived singly and in parties of up to five, starting over an hour before dark (Holt, pers. comm. 2000). **Breeding status**: Feeding of fledged youngsters was observed in early February (Hill 1995) and mid-June. **Seasonal status**: Present throughout the year in numbers that fluctuate little.

(1881-3) **Citrine Wagtail** ***Motacilla citreola*** Pallas

(Yellow-hooded Wagtail, Yellow-headed Wagtail)

First recorded on 13th March 1983 at the Parxem-Agarwaddo paddy-fields. **Status**: A somewhat irruptive winter visitor to all regions that is normally scarce to uncommon, but locally abundant in some years. Occurs mostly in the coastal belt and river basins, rarely in the midlands and occasionally at the foot of the Western Ghats. **Habitat**: Invariably encountered at irrigated *vaingonn* paddy-fields and occasionally in marshes and on pool margins. **Favoured sites**: Paddyfields at Parxem-Agarwaddo***, Baga, Carambolim, Santa Cruz, Velsao, Kalay* and Collem**. **Other sites**: Paddyfields at Siolim-Gudem, Chorao-Tikanem, Merces, Usgao and ponds at Ciba-Geigy. **Population**: Usually seen singly or in twos. Loose flocks of between 300 and over 500 birds were observed in the paddy-fields of Parxem-Agarwaddo, in March 1984, 1985 and late February 1988. **Seasonal status**: This wagtail arrives in late November (earliest record: 17th) and departs by mid-March (latest record: 28th). By far the most sightings and the ones with the highest number of individuals are from March, suggesting a spring passage migration.

(1875-80) **Yellow Wagtail** ***Motacilla flava*** Linn.

First recorded on 13th November 1981 at the Baga fields. **Status**: A widespread and common, locally abundant dry season visitor mainly to the coastal plain and river basins that is also found at the base of the Western Ghats. **Habitat**: Encountered in very much the same habitat as Citrine Wagtail. 'Yellow Wagtails frequently occur, often in association with cattle or with a variety of 'freshwater waders' such as Wood Sandpiper, Little and Temminck's Stints, in large flocks with birds often appearing suddenly and opportunistically at newly flooded paddy-fields.' (Holt *in litt.* 2000). **Population and seasonal status**: 'Generally present in small numbers from the end of October, it is usually not until the paddies are irrigated and tilled towards the end of November that a second and more major immigration occurs. Parties of up to 60 birds are then regularly noted, though they rarely stay in one place for long, moving on in response to local conditions that affect the drying or flooding of their preferred sites. Peak numbers are usually reached December to mid-February when parties of up to 300+ birds have been reported' (Holt *in litt.* 2000). The earliest arrival was noted on 26th September. Departure can be protracted and is, at least in some years, concluded by a short and distinct spring passage at the end of April when the population in some wetlands suddenly shoots up again to several hundred birds. The last Yellow Wagtails of the season were seen on 5th May. **Miscellaneous**: 'Although non-breeding males, females and immatures are often very difficult to identify racially at least three forms occur in Goa. Little is known about any of them – other than their relative statuses – "Grey-headed Wagtail" *M. f. thunbergi* is generally the most commonly reported followed by "Blue-headed Wagtail" *M. f. beema* and lastly "Black-headed Wagtail" *M. f. melanogrisea*' (Holt *in litt.* 2000).

(1884) **Grey Wagtail** ***Motacilla cinerea*** Tunstall

First reported by Grubh and Ali (1976), who noted it at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A fairly common and widespread dry season visitor to all zones, from the coast to the crest of the Western Ghats. **Habitat**: This species prefers freshwater to brackish and saline sites. It occurs at pools, tanks, fish and prawn ponds, damp fields, marshes, flooded *vaingonn* paddy-fields and at rivers or streams in all types of forest, even dense wet evergreen. It is occasionally, usually during migration, encountered on beaches and at more arid sites e.g. Morjim beach on 4th November 1999 and the arid Dona Paula plateau on 20th November 1998 (Holt 1998b, 1999). **Population**: Generally met with singly, less often in pairs and only occasionally in small loosely associating parties. **Seasonal status**: The Grey Wagtail arrives variously in September, October or even as late as November (earliest record: 2nd September) and leaves in April (latest record: 21st).

(1857) **Richard's Pipit** ***Anthus richardi*** Vieillot

(*Anthus novaeseelandiae*)

Until 1998, Richard's Pipit was considered a subspecies of the Paddyfield Pipit *Anthus novaeseelandiae*. The author has only a single clear-cut record of this species (when a single specimen was perched among seven Paddyfield Pipits on a powerline at Divar-Navelim, on 27th September 1998) and is inclined to dismiss records that were not made under similar circumstances as mere 'hunches'. Holt (*in litt.* 2000) appears to be very much aware of this situation and sums it up: 'Considerable identification problems have made the large pipits one of the hardest groups of Indian birds to identify and frequent misidentifications have clouded their relative statuses here as elsewhere.' The following account consists largely of excerpts and quotes from Holt's writings on this species (*in litt.* 2000). **First reported** by Holt (1996b), who recorded up to 20 birds at the fields of Arpora-Baga in December 1996. **Status**: 'Richard's Pipit is a locally common winter visitor to a handful of sites in the coastal zone, it is scarce in the midland zone and apparently very uncommon (or perhaps more correctly seldom reported) far from the lowlands.' **Habitat**: 'Found in similar habitats to those frequented by Malabar Lark – primarily steppe-like grassland and areas of cultivation, both abandoned and current, – it is generally the commonest and most widespread of the migrant pipits. As a general rule Richard's Pipits prefer moister, more fertile grassland with a thicker, denser covering of grass than Blyth's and especially Tawny Pipit.' **Sites**: Arambol (Pernem); Baga fields and ridge, Candolim, Nerul marsh, Sinquerim marsh (Bardez); Chorao, Divar, Carambolim grasslands, Neura, Santa Cruz, Dona Paula plateau (Tiswadi); near Mollem Tourist Complex (Sanguem). **Observers**: Burfield (1998), Holt (1996a, 1996b, 1997, 1998a, 1998b, 1999), Jännes (1998) and Lassey (1999). **Population**: 'Day counts are typically in the range of 2-12 birds, but loose flocks of around 20 and up to 35 individuals have been recorded.' **Seasonal status**: 'Details are scarce but it probably arrives in the state in mid- to late October and remains until March, possibly reaching a peak in December-January but continuing to move around locally (as do Blyth's Pipits with which it often loosely consorts) throughout the winter.'

(1858-60) **Paddyfield Pipit** ***Anthus rufulus*** Vieillot

(Oriental Pipit, *Anthus novaeseelandiae*)

Since the author has not kept separate notes for the two forms until the split between this species and Richard's Pipit in 1998, it is perhaps appropriate to quote again extensively from Holt's writings (*in litt.* 2000). **Status**: 'A fairly common year round resident of grassland in the coastal and midland belts. Although never as locally common as the wintering Richard's Pipits, Paddyfield Pipit is easily the most widespread and most frequently encountered large pipit. Commonest in the coastal plain it becomes increasingly scarce towards the base of the Western Ghats.'

Habitat: 'Although most common in slightly damper areas than all of Goa's other pipits, Paddyfield Pipit is found in a wide variety of open habitats. These range from the belt of beach creepers immediately behind the high tide line (Lainer 1999b) to the fringes of marshes, short cattle-grazed fields and stony ridge tops.' **Population**: 'Usually found in pairs, and frequently (at least in November-December) in song.' Typical day counts range from one to a dozen birds. **Breeding status**: There is as yet no indication that the Paddyfield Pipit breeds in Goa. **Seasonal status**: 'Lainer (1999b) follows the taxonomy adopted in Ripley's 1982 *Synopsis* and treats Paddyfield and Richard's Pipits as the same species *A. novaeseelandiae*. Consequently he did not discriminate sufficiently between the two populations and noted that a "small resident population, possibly only over-summering non-breeding birds, is found in the coastal region..." Undoubtedly referring here to Paddyfield Pipit, it is surprising he suspects that summering birds are non-breeders. He goes on to note that 'large numbers of winter visitors arrive in two distinct thrusts (usually in early September and again at the beginning of October and occupy all three zones up to the base of the Ghats. The more diffuse outward movement lasts through April into May. As Paddyfield Pipit *senso stricto* is a resident he is probably now referring to Richard's Pipits and it is interesting to note that he distinguishes two influxes – could one of these refer to an influx of Blyth's Pipits and the other to Richard's?'

(1861-2) **Tawny Pipit** ***Anthus campestris*** (Linn.)

First recorded by Willoughby (1994), who observed three birds at Dona Paula, in November 1994. **Status**: A scarce winter visitor mainly to the coastal belt (with single sightings each from the midlands and the base of the Western Ghats). **Habitat**: Wasteland, abandoned cultivation and rocky or stony hills, ridges and plateaus. **Sites**: Arambol (Pernem); Chapora fort, Anjuna-Vagator, Baga fields, Fort Aguada (Bardez); Divar-Navelim, Carambolim, Santa Cruz, Dona Paula (Tiswadi); Goa Meat Complex area (Ponda); ZAC reservoir (Marmagoa); Backwoods Camp (Sanguem). **Observers**: Anon (1998a), Duffield (2000), Frost (pers. comm.), Holt (1996a, 1996b, 1997, 1998a, 1998b, 1999), Jännes (1998), Robson (1999), Tunturi (1998), Vermeulen (2000), Wadsworth (1999), Willoughby (1994, 1995), Woolley (1999) and the author. **Population**: Usually encountered singly or in pairs, fairly often in small parties of three and four. **Seasonal status**: Sightings span the period between 10th October and 18th February. **Miscellaneous**: Holt (*in litt.* 2000) has seven records of single birds and one of two flying south, all between 7th November and 5th December, at Baga and Fort Aguada. It is unclear whether these were birds on autumn passage or on a diurnal movement.

(1863) **Blyth's Pipit** ***Anthus godlewskii*** (Taczanowski)

(Godlewski's Pipit)

'Considerable identification problems have clouded the true status of most pipits in Goa and that of Blyth's Pipit more than most.' (Holt *in litt.* 2000). The author has

not felt confident enough yet to identify this pipit with certainty. The following account is therefore gleaned from Holt's write-up on this species. **First reported** by Pitt (1995), who noted 2-6 birds on five days between 23rd December 1994 and 2nd January 1995. **Status**: Probably a generally scarce but locally fairly common winter visitor to the coastal belt of North Goa. **Habitat**: Blyth's Pipits are often found in the same areas as other large pipits though they apparently prefer drier areas of grassland and abandoned cultivation, particularly sites with up to six inches of stubble remaining. **Sites**: Chapora fort, Baga fields and ridge, Candolim fields, Fort Aguada (Bardez); Dona Paula ridge (Tiswadi). **Observers**: Burfield (1998), Holt (1996a, 1996b, 1997, 1998a, 1998b, 1999), Jännes (1998), Pitt (1995). **Population**: Singles and groups of up to 10 birds are the most frequent configuration. Flocks of 13, 14 and *ca.* 30 individuals were observed once each. Numbers fluctuate markedly from one year to next. **Seasonal status**: All reports are currently between 30th October and 13th February though birds are possibly present for up to a month either side of these dates.

(1854-5) **Tree Pipit** ***Anthus trivialis*** (Linn.)

(Brown Tree Pipit, Eurasian Tree Pipit)

First reported by Grubh and Ali (1976), who collected a specimen at Mollem and also observed it at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. They were unable to identify the specimen as to subspecies. **Status**: A widespread and fairly common winter visitor to the coastal belt and river basins, midland region and the base and crest of the Western Ghats. **Habitat**: Dry and moist grassland, fallow and stubble fields, abandoned cultivation, grassy lateritic plateaus and ridges etc., *shola* country on the crest of the Ghats. **Coastal sites**: Terakol, Arambol (Pernem); Colvale, Tivim-Damedem, Siolim-Marna, Chapora Fort, Anjuna, Nagoa, Baga fields, Saligao, Pilerne, Candolim, Fort Aguada (Bardez); Chorao, Divar, Carambolim, Neura, Santa Cruz, Dona Paula (Tiswadi); Curtorim-Maina (Salcete); Chauri fields (Canacona). **Ghat sites**: Surla (Sattari); top of Dudhsagar waterfalls, Bhagwan Mahavir WS, Mollem, Collem (Sanguem). **Population**: Rarely encountered solitary. Groups of single-digit strength appear to be the norm, though flocks of up to 30 birds have been noted occasionally. Often in close proximity to Malabar Larks, Blyth's and Richard's Pipits, though generally preferring areas of slightly longer grass than these. Numbers tend to fluctuate from one year to the next. **Seasonal status**: Present between early November (earliest record: 24th October) and mid-March (latest record: 22nd).

(1852-3) **Olive-backed Pipit** ***Anthus hodgsoni*** Richmond

(Olive Tree Pipit, Hodgson's Tree Pipit, Indian Tree Pipit)

First reported by Grubh and Ali (1976), who collected a specimen at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972.

They found it difficult to ascribe their single specimen to one or the other of the two subspecies. Saha and Dasgupta (1992) were confident enough to place the specimen they had collected at Cotigao on 12th February 1978 under the nominate *A. h. hodgsoni*. **Status**: A scarce winter visitor to the base of the Western Ghats. **Habitat**: Clearings, cuttings and tracks in semi-evergreen and evergreen forest. **Sites and sightings**: Grounds and gardens of the Mollem Tourist Complex (seven sightings) and Bhagwan Mahavir WS (6). **Observers**: Hill (1995), Holt (1996a, 1996b, 1997, 1998a), Lainer (1999b), Marsh (1998), Sutton (1997) and Willoughby (1993). **Population**: Small loosely knit groups of up to 10 specimens of this only moderately gregarious pipit were observed. **Seasonal status**: Sightings span the period from 11th November to 15th March. **Remarks**: In the light of the scarcity of subsequent sightings it is difficult to imagine how Saha and Dasgupta (1992), presumably writing about their impressions in 1978 when they collected their specimen, could arrive at their statement that 'The Indian Tree Pipit is a very common bird of Goa during winter. It frequents Eucalyptus plantations in loose flocks.' The author, despite being actively on the lookout for this species, had only a single sighting throughout the eighties! Various visiting 'birders' reported sightings of this species at and around Baga – almost certainly the result of misidentifications.

(1864) **Red-throated Pipit** ***Anthus cervinus*** (Pallas)

Status: Vagrant. **Sightings**: Willoughby (1993) reported three birds on 9th and singles on 11th and 19th March 1993, at Baga. Frost and Manville (pers. comm.) observed a male bird in pre-breeding spring plumage on pastures in Candolim, on 13th March 1997.

PLOCEINAE
Weavers

(1957-9) **Baya Weaver** ***Ploceus philippinus*** (Linn.)

(Baya, Indian Baya)

First reported by Grubh and Ali (1976), who collected a specimen at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. They assigned the subspecies to *P. p. philippinus*. Saha and Dasgupta (1992) collected a specimen at Nanuz on 26th February 1978 during their last collecting trip to Goa for the Zoological Survey of India and ascribed it to the subspecies *P. p. travancorensis*. Their comment was a barbed 'The occurrence of both *philippinus* and *travancorensis* in the same locality is rather intriguing.' **Status**: A widespread and common, seasonally and locally abundant breeding resident that is found in all three zones, from the coast to the base of the Western Ghats. **Habitat**: Invariably found in the vicinity of standing paddy crops if such are available; affects in the off-

Baya Weaver

season also fallow paddy-fields, sugarcane, scrub, grassland, wasteland and stands of sedges in saline wetlands. Large day and night roosts were observed in sea holly along tidal creeks. **Population**: This highly gregarious bird is encountered in parties of ten or more and flocks in excess of one hundred birds are not infrequent. The largest counts are from Candolim where Holt (*in litt.* 2000) estimated *ca.* 600 in mid-December 1996 and *ca.* 900 in late November 1997 and from the Baga creek were well over a thousand birds congregated at a night roost in sea holly, in early January 1996. **Breeding status**: Nest building starts in late May and breeding activities last throughout the southwest monsoon into September. This season is predominant in the coastal belt and river basins. A minor second breeding season, parallel to the winter *vaingonn* paddy-growing season, begins in late October and is more prevalent in the midland region where groundwater sources for irrigation are more readily available. **Seasonal status**: Recorded throughout the year, but largely absent in March, April and early May. Bayas are more widespread and numerous during the rain-fed monsoon *kharif* paddy season while they seem more conspicuous during the irrigated winter *vaingonn* crop of the midlands when juvenile and non-breeding birds congregate in huge nomadic flocks that roam far into the coastal belt. **Plumages**: Male birds moult into breeding plumage in late May and June and change into non-breeding plumage in August-September. Partial breeding plumage was noted in October and November.

ESTRILDINAE
Estrildine Finches

(1967-70) **White-rumped Munia *Lonchura striata*** (Linn.)
(White-backed Munia, Striated Munia, Sharp-tailed Munia)

First reported by Grubh and Ali (1976), who collected a specimen of the nominate *L. s. striata* at Mollem and also observed a party of three at Canacona during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: A widespread and common breeding resident in all three regions, from the coast to the lower slopes of the Western Ghats, that also occurs on the crest of the ghats. **Habitat**: This munia occurs in a wide variety of habitats such as gardens, open woodland, grassland and pastures, standing paddy, clearings in moist deciduous, semi-evergreen and even dense wet evergreen forest. **Population**: Single figure counts are the norm during the breeding season but non-breeding birds frequently congregate at favourite sites in flocks of up to 70 individuals. **Breeding status**: Nest building was noted in February, May, July, August September and November, incubation in February and September. **Seasonal status**: Present throughout the year in unchanging numbers.

(1971-3) **Black-throated Munia *Lonchura kelaarti*** (Jerdon)

(Rufous-bellied Munia, Hill Munia, Jerdon's Mannikin)

First reported by the author (1999b), who observed two birds between Caranzol and Gotkewadi railway stations at the Braganza Ghat, on 14th October 1986. **Status**: The subspecies *L. k. jerdoni* of this Indian subcontinent endemic is a rare visitor that exclusively occurs in the Western Ghats strip, from the foothills up to an altitude of at least 500 metres. **Habitat**: Found on the fringes of and at clearings in riverine, semi-evergreen and wet evergreen ghat forest. **Population**: Five sightings were of pairs and one each of 4, 5, 6 and 8 birds. **Sites and sightings**: Bhagwan Mahavir WS (6 sightings), Cotigao WS (2), Backwoods Camp (2). **Observers**: Van der Dol (1999, 2000), Beevers (2000), Frost (pers. comm.), Whalin (1999), Willoughby (1997) and the author. **Seasonal status**: Sightings span the period from October (earliest record: 14th) to February (latest record: 16th).

(1974-5) **Scaly-breasted Munia *Lonchura punctulata*** (Linn.)

(Spotted Munia, Nutmeg Mannikin, Spice Mannikin)

First reported by Saha and Dasgupta (1992), who collected a specimen of the nominate *L. p. punctulata* at Caranzol (Sattari), on 1st March 1978, during one of their many collecting trips to Goa for the Zoological Survey of India. **Status**: Uncertain. A patchily distributed, scarce, locally fairly common visitor to a few sites in the coastal belt that is occasionally encountered at the base of the Western Ghats. **Habitat**: Found on, often damp, grassland and pastures, in standing paddy and around cultivation. **Sites and sightings**: Baga creek and paddy-fields (58 sightings), Candolim pastures (3), Cotigao WS (2), Mollem (2), Nagoa valley (1). **Population**: Single figure counts are the norm though flocks of up to 20 birds, adults and juveniles, are not uncommon. Lassey (2000) counted 25 birds in late January and Holt (1999) 32 birds in mid-November, both in the Baga area. Saha and Dasgupta (1992) considered the Scaly-breasted Munia as 'common practically all over Goa' at the time of their collecting trips to Goa, 1968 to 1978. This is at variance with the author's observations throughout the eighties, in which he had a single sighting. Only since the early nineties, sightings appear to have become more frequent. **Seasonal status**: Nearly all sightings are from the period between 7th October and 28th April though Frost (pers. comm.) observed a few individuals in early July and early August.

(1976-8) **Black-headed Munia *Lonchura malacca*** (Linn.)

(Chestnut Munia)

First recorded at Divar-Navelim on 29th October 1987. **Status**: An uncommon, patchily distributed and probably breeding seasonal visitor mainly to the coastal belt and river basins that is occasionally encountered in the midlands and at the

base of the Western Ghats. **Habitat**: This munia is found at *bundhs*, stands of long grass, sedges and sea holly in saline or brackish wetlands, at standing paddy, waste-land with a scattering of bushes etc. **Favoured sites**: Carambolim paddy-fields and wetlands (13 sightings), Divar (6), Baga area (5), Bondla (3), Sinquerim-Nerul creek area (3), Candolim (3), Ciba-Geigy (2), Mayem lake (2), Backwoods Camp (2). **Other sites** (single sightings): Paliyem, Saligao spring, Tivim-Damedem, Chorao-Tikanem, Santa Cruz paddy-fields, Dona Paula, Arvalem, Mollem, Collem. **Distribution**: Not yet recorded south of the Zuari river. **Population**: This gregarious bird is usually encountered in pairs and groups of up to a dozen birds. The largest flock, of at least 40 individuals, was seen by Holt (1998b) on 8th November 1998 at the Carambolim paddies. **Breeding status**: Holt (1999) observed two juveniles being fed by both parents near Santa Cruz on the 11th November 1999, an indication that this species might breed locally. **Seasonal status**: The presence of this bird appears to be closely linked to standing paddy, monsoon crop as well as winter *vaingonn*. The earliest record dates from 5th August, the latest from 23rd February.

FRINGILLIDAE

FRINGILLINAE
Finches

(2010-3) **Common Rosefinch** *Carpodacus erythrinus* (Pallas)
(Scarlet Rosefinch, Scarlet Grosbeak)

First recorded at the Nagoa valley on 20th February 1982. **Status**: An uncommon, irregular and irruptive winter visitor to all regions. **Habitat**: Usually found in open woodlands, at cultivation with a sprinkling of trees, village outskirts and moist deciduous and semi-evergreen forest. **Sites and sightings**: Bondla WS (15 sightings), Bhagwan Mahavir WS (6), Nagoa valley (6), Cotigao WS (4), Baga (3), Terakol (2), Candolim (2) and Calangute (1). **Population**: Most often encountered singly or in groups of up to ten birds, though flocks of 2-300 have been recorded in February and March 1982 and flocks of up to a hundred birds in February and early April 1988. These large flocks in irruption years consisted almost exclusively of female and/or immature birds. **Seasonal status**: Records cover the period between 3rd November and 14th April. By far the most sightings date from March, suggesting a spring passage migration.

EMBERIZINAE
Buntings

(2050) **Grey-necked Bunting** ***Emberiza buchanani*** Blyth

First reported by Pitt (1995) who observed two birds at the Baga fields on 27th December 1994. **Status**: A casual winter visitor to a few sites in the coastal belt of North Goa; also reported from the base of the Western Ghats. **Habitat**: Dry grassland and fallow cultivation. **Sites and sightings**: Baga area (23 sightings), Chapora Fort (2), Candolim fields (1), Chorao (1), Carambolim grassland (1), Tambdi Surla (1), Backwoods Camp (1). **Observers**: Beevers (1999), van der Dol (1999), Hill (1995), Holt (1996b, 1997, 1998b, 1999), Jännes (1998), Leigh (1998), Lynes (1999), Pitt (1995), Prasad (1999), Ransdale (1998), Robson (1999), Sykes (1999), Tunturi (1997, 1998), Whalin (1999) and Woolley (1999). **Population**: 'Most reports are of single birds, though occasionally two are seen together and while found at essentially the same sites they rarely, if ever, join the larger and more frequent parties of Black- and Red-headed Buntings' (Holt *in litt.* 2000). **Seasonal status**: Sightings span the period between 14th November and 17th February.

(2043) **Black-headed Bunting** ***Emberiza melanocephala*** Scopoli

First reported by Grubh and Ali (1976), who collected a female specimen at Mollem during their ornithological survey of Goa from 27th November to 12th December 1972. **Status**: An uncommon, somewhat irregular and irruptive winter visitor to the coastal belt, midland region and base of the Western Ghats that is scarce in most years but relatively common and conspicuous in others. **Habitat**: Areas of dry grassland, abandoned cultivation, wasteland, scrub covered plateaus and coastal headlands. **Sites and sightings**: Baga area (30 sightings), Mollem (3), Tambdi Surla (3), Carambolim grassland (3), Bondla WS (2), Zuarinagar (2). Single sightings are from Terakol, Anjuna, Candolim, Goa Meat Complex area and Backwoods Camp. **Population**: Usually seen singly or in small groups of up to five birds though flocks of up to 250 occur in some years. **Seasonal status**: The first birds arrive at the end of October (earliest record: 20th); numbers possibly peak in November and there is then a gradual decline in the number of reports until mid-January (latest record: 7th February).

(2044) **Red-headed Bunting** ***Emberiza bruniceps*** Brandt

First reported by Smithson (1996), who saw a pair near Mollem on 16th November 1996. **Status**: A scarce and irregular winter visitor to the coastal belt and base of the Western Ghats. **Habitat**: Largely the same as for Black-headed Bunting. **Sites and sightings**: The Baga area with 16 sightings is clearly the most favoured site (or the

one that is most worked over by visiting birdwatchers). Single sightings are from Arambol, the Nerul bridge area, Carambolim grasslands, Neura wetlands, Back-woods Camp and Tambdi Surla. **Observers**: Beevers (1999), Dennis (1999), van der Dol (1999), Frost, Griggs (1996), Holt (1996b, 1997), Jännes (1998), Leigh (1998), Prasad (1999), Smithson (1996), Tarrant (1997), Tunturi (1997), Welland (2000), van der Wielen (1998), Woolley (1999) and the author. **Population**: Groups of up to six birds were noted, often associated with larger flocks of Black-headed Buntings. **Seasonal status**: Records span the period between 16th November and 7th February.

Appendix

The Appendix contains unconfirmed records of birds that are either difficult to identify in the field or frequently misidentified by inexperienced observers or are contentious for various other reasons. It also includes records from areas just a few kilometers beyond Goa's borders and historical records.

(259-61) **Rock Bush Quail *Perdicula argoondah*** (Sykes)

Status: Uncertain. Possibly a rare and locally distributed resident. **Sightings**: A single was seen by Holt (1998b) near the fort at Terakol, on 25th November 1998, two birds were observed by Sykes (1999) on the hill separating Baga from Anjuna, in mid to late January 1999 and an unspecified number by Vermeulen (2000) at Carambolim, on 8th February 2000.

(89) **Fulvous Whistling Duck *Dendrocygna bicolor*** (Vieillot)

(Fulvous Tree-duck, Large Whistling Teal)

Status: Vagrant. **Sightings**: 20 birds were observed by Moir and Carlton on 18th April 1996 (*fide* Harris 1996), a single by Harris (1996) on 7th May 1996 and two birds on 27th December 1998 by Lynes (1999). All sightings are from the Carambolim lake.

(558-9) **White-naped Woodpecker Chrysocolaptes festivus** (Boddaert)

(Black-backed Woodpecker)

Status: Unclear. This subcontinent endemic is possibly an extremely rare resident. **Sightings**: Vermeulen (2000) recorded a pair at Mayem Lake on 7th February 2000. The author was told by a Goan amateur naturalist about an occurrence near the Anjunem dam, sometime in the year 2000.

(696) **Common Swift *Apus apus*** (Linn.)

(Swift, Eurasian Swift, Black Swift)

Status: Vagrant. **Sightings**: A single bird was observed in the 'Mandovi river area' by Welland (2000) in mid-December 1995. Two individuals were seen at the Baga

ridge on 1st February 1998 (Newscome *pers. comm.* to Holt 2000) and a single on 10th February 1998 (Anon 1998a). Holt (1998a) spotted a single bird near Bondla on 4th February 1998.

(697) **Pallid Swift *Apus pallidus*** (Shelley)

Status: Vagrant. **Sightings**: Wilson (1997) observed a single specimen at Calangute on 29th November 1997 and Johnson (1997) recorded a single, possibly the same bird, at Morjim beach, flying south with House Swifts, sometime in November-December 1997.

[(625-7) **Eurasian Eagle Owl *Bubo bubo*** (Linn.)]

(Eagle Owl, Northern Eagle Owl, Great Horned Owl, Indian Eagle Owl, Rock Eagle Owl, *Bubo bengalensis*)

Historical record: 'A pair are generally to be found at the side of the hill at Sadasheogarh, north of Karwar' (Davidson 1898). This coastal site, now called Sadashivgad, in Uttar Kanara district of Karnataka is just 8-10 kilometres south of the Goa border.

(630) **Dusky Eagle Owl *Bubo coromandus*** (Latham)

(Dusky Horned Owl)

Status: Uncertain. **Sightings**: One bird each was observed by the author (1999a) in daytime in a dense patch of remnant semi-evergreen woodland at Terakol, on 16th June 1986, and in a very similar tract of the Nagoa valley, on 2nd January 1996.

(655-7) **Mottled Wood Owl *Strix ocellata*** (Lesson)

Status: Uncertain. **Sighting**: One 'gave good but brief views early on 14th November 1996 – in the forest 3 kilometres along the Devil's Canyon trail' in the Bhagwan Mahavir WS (Smithson 1996).

(572) **Large Hawk Cuckoo *Hierococcyx sparverioides*** Vigors

(*Cuculus sparverioides*)

First reported by Arnold (1997) who observed a single bird near the Cumbarjua canal on 27th November 1997. **Status**: This Himalayan cuckoo is possibly a very rare winter visitor that was recorded in the coastal belt, the mid-land region and at the base of the Western Ghats. **Sightings**: A solitary bird was recorded by Woolley (1999) at the Backwoods Camp, on 28th December 1998. Lassey *et al.* (2000) observed a single at the Mayem lake, on 19th and 29th January 2000. Possibly the same bird was seen there by van der Dol (2000) on 6th February 2000.

(680-1) **Indian Nightjar** ***Caprimulgus asiaticus*** Latham

(Little Nightjar, Common Indian Nightjar)

Status: Uncertain. **Sightings**: This species was noted in the Arpora-Baga area by van der Wielen (1998) on 15th November 1998 and by Dennis (1999) on 8th December 1999. Whalin (1999) recorded it at Tambdi Surla on 29th January 1999.

(503-5) **Yellow-footed Green Pigeon** ***Treron phoenicoptera*** (Latham)

(Yellow-legged Green Pigeon, Bengal Green Pigeon, Green Pigeon, Yellow-footed Pigeon)

Status: Uncertain. This species is fairly common in the Dandeli WS (Uttar Kanara, Karnataka) that is almost contiguous to the Bhagwan Mahavir WS in Goa. **Sighting**: The only record is by Rane (1983) who claims to have observed it in the Bondla WS during one of his trips to Goa from 18th – 24th May 1981, 6th – 10th April and 16th – 22nd June 1982.

(323-4) **Sarus Crane** ***Grus antigone*** (Linn.)

Status: Vagrant. **Sighting**: Hill (1998a) observed four birds between Carambolim lake and the Carambolim grasslands on 20th January 1998.

(342) **Brown Crake** ***Amaurornis akool*** (Sykes)

Status: Uncertain. **Sightings**: Prasad (1996) observed this species at a marsh in the Arpora-Baga area in December 1996 and Marsh (1998) at Bondla (!!) on 6th February 1998.

(335-6) **Little Crake** ***Porzana parva*** (Scopoli)

Status: Uncertain. **Sighting**: Prasad (1996) observed two birds in paddyfields at Arpora-Baga in December 1995.

(338) **Spotted Crake** ***Porzana porzana*** (Linn.)

Status: Presumably a rare winter visitor (rather than a vagrant) to coastal marshes in Goa. **Sightings**: A single specimen was seen by Holt (1996b) in the evenings of 15th and 18th December 1996 in a marsh at Arpora-Baga.

(412) **Red Knot** ***Calidris canutus*** (Linn.)

(Knot)

Status: Vagrant. **Sighting**: The author (1999b) observed a specimen that was either a juvenile or an adult moulting into winter plumage at Morjim beach on 18th September 1998. The bird was feeding along the water's edge in the company of several Greater Sand Plovers and two Sanderlings.

(427, 428) **Phalarope sp.** ***Phalaropus sp.***

Status: Vagrant. **Sighting**: Heikki and Leena Luoto (*in litt.* to Holt 2000) saw two birds from Hotel Cidade de Goa, at the mouth of the Zuari river, on 30th December 1998. They had 'seen in flight before landing on the sea – too distant to be identified to species.' Either Red-necked *P. lobatus* or Grey Phalarope *P. fulicaria.*

(447-8) **Jaeger spec.** ***Stercorarius spec.***

First recorded on 13th September 1990 when a single bird was seen off the Anjuna coast. **Status**: A scarce but almost regular autumn and irregular spring visitor or passage migrant in the waters off Goa. **Habitat**: Open sea; not yet seen closer than 500 metres to the coast. **Sightings**: Of the 18 sightings in the years between 1990 and 2001 twelve date from the months of September through November, while 6 sightings fall into the period March through June. Madsen (1990) reported 49 sightings of Jaegers (some of them possibly duplicated) between early September and mid-December 1987 off Gokarn (Uttar Kanara, Karnataka), about 70 kilometres south of Goa. The author had several sightings of unidentifiable Jaegers off the Vengurla Rocks (Sindhudurg distr., Maharashtra), *ca.* 32 kilometres north of Goa. **Population**: 14 sightings were of single birds, three of two and one was of three. **Seasonal status**: Spring migration was noted between 18th March and 14th June, autumn migration between 12th September and 29th November. **Colour phases**: The ratio of dark phase/pale phase is 1:12. **Remarks**: All the individuals seen off the Goa coast apparently were in non-breeding plumage, i.e. lacking the tail protuberances that alone could identify them safely. Willoughby (1993) who sighted a single immature bird from a boat off Chapora on 18th March 1993 identified it as Pomarine Jaeger *Stercorarius pomarinus*. The pale morph adult individual seen on 29th November 1998 about five kilometres off Baga by van der Wielen (1998) was ascribed by him to Parasitic Jaeger *S. parasiticus*.

Mew Gull ***Larus canus*** Linn.

(Common Gull)

Status: Vagrant. **Sightings**: A first winter individual was seen with other gulls at Morjim on 14th December 1996 by Holt, Hyde *et. al.* (Holt 1996b). Dennis (1999) observed three adult birds at Morjim on 30th November 1999. **Remarks**: These two sightings, if genuine, would be the southernmost of the very few records in the Indian subcontinent.

(452) **Lesser Black-backed Gull** ***Larus fuscus*** Linn.

Status: Formerly thought to be a 'Winter visitor to the coasts of Pakistan and the Indian peninsula. Several sightings in Sri Lanka.' (Ripley 1982). However, Grimmett *et al.* (1998) state 'No confirmed records of this species for the subcontinent. Pub-

lished records .... are now regarded as unacceptable. Confusion with Heuglin's Gull is the most likely explanation for most of the reports of this species.' **Sighting**: On 9th September 1998, Frost and the author observed on Morjim beach a largish white-headed gull with deep coal-black mantle and no flecking on head and neck among hundreds of Yellow-legged Gulls *Larus cachinnans* and a few Heuglin's Gulls *Larus heuglini*. The bird was markedly smaller than a Heuglin's Gull and conformed well to the description of the nominate race of Lesser Black-backed Gull which 'winters throughout the Red Sea down to Kenya' (Davidson 1985).

(168) **Tawny Eagle *Aquila rapax*** (Temminck)

(Aquila nipalensis)

Status: Uncertain. **Sighting**: A single specimen was seen and filmed by P. Doherty over the paddyfields of Santa Cruz, on 5th November 1999 (*fide* Holt 1999).

(1089a) **Ashy Minivet *Pericrocotus divaricatus*** (Raffles)

Status: Vagrant. **Sightings**: A constantly calling bird was observed circling Fort Aguada on 8th November 1997 by Holt (1997). Dennis (1999) and several other observers in his group saw a single near the Backwoods Camp, on 6th December 1999.

(1451-3) **White-browed Fantail *Rhipidura aureola*** Lesson

(White-browed Fantail-flycatcher, White-breasted Fantail-fly-catcher)

Status: Uncertain. **Sightings**: Holt (1996a) observed a single bird on Baga hill on four dates in January-February 1996. Later he added: 'I'm now unsure what to make of this record. This was my first visit to Goa & in light of the fact that I haven't encountered the species subsequently am uneasy with the record.' (Holt *in litt.* 2000). Dennis (1999): 'A pair on Baga Hill showed well on 30th December 1999. Other observers saw these birds on subsequent dates but we never bumped in to them again.' Lassey (2000) claims four sightings of up to four birds at Baga, Sinquerim, Bondla WS and Tambdi Surla in mid and late January 2000.

(1707) **Rufous-tailed Wheatear *Oenanthe xanthoprymna*** (Hemprich & Ehrenberg)

(Red-tailed Wheatear)

Status: Vagrant. **Sighting**: Willoughby (1997) observed a single example of this desert species, whose normal Indian wintering grounds lie in the semi-desert areas of the north-west (the Punjab, Rajasthan and Gujarat), near the Goa Meat Complex on the 16th February 1997. This is apparently the most southerly record in the Indian subcontinent (Holt *in litt.* 2000).

(1709-10) **Desert Wheatear *Oenanthe deserti*** (Temminck)

Status: Uncertain. Possibly a vagrant. **Sightings**: Smithson (1996) observed a single in dry open habitat south of the Chapora fort in early to mid-November 1996. It had apparently already been present for two weeks. Whalin (1999) saw a single at beach dunes in Candolim on 17th January 1999. This was probably the same bird that was reported as an Isabelline Wheatear by Wadsworth (1999).

[(990-2) **White-headed Starling *Sturnus erythropygius*** (Blyth)]

(White-headed Myna)

Reported by Rane (1984a) who claimed to have observed it at Mollem during one of his Goa trips from 18th – 24th May 1981, 6th – 10th April and 16th – 22nd June 1982. 'There are no documented extralimital reports of this, a sedentary endemic that is restricted to the Andaman and Nicobar Islands in the Bay of Bengal and we feel that Rane was undoubtedly mistaken, either in his identification or in the documentation. Perhaps he meant to refer to the apparently closely related Chestnut-tailed Starling *S. malabaricus* though Grubh and Ali (1976) had already documented this species' presence in the state' (Holt *in litt.* 2000).

[**Wren Babbler sp. *Spelaeornis sp.***]

Included by Shyama and Gowthaman (1995) in a list of species recorded on the Goa University Campus, five kilometres south of Panaji and described as rare. Khachar (1995) pointed out that an error must have been made.

(1519-23) **Jungle Prinia *Prinia sylvatica*** Jerdon

Status: Uncertain. **Sighting**: A single bird was seen by the author (1999b) in the Nagoa valley, on 5th December 1995.

(1574-5) **Common Chiffchaff *Phylloscopus collybita*** (Vieillot)

(Chiffchaff, Eurasian Chiffchaff, Brown Leaf Warbler)

Status: Uncertain. Probably a rare or occasional winter visitor to the coastal belt and the base of the Western Ghats. **Habitat**: Various types of forest in the Ghats and remnant forest patches on plateau-scarps facing the coastal strip. **Sites**: Baga, Nagoa valley (Bardez); Bondla WS (Ponda); Mollem, Bhagwan Mahavir WS (Sanguem); Cotigao WS (Canacona). **Observers**: Burfield (1998), van der Dol (2000), Griggs (1996), Lassey (1999), Marsh (1998), Sutton (1997), Willoughby (1993) and the author. **Seasonal status**: Records span the period from 10th October (??) to 30th March.

(1579) **Tickell's Leaf Warbler** ***Phylloscopus affinis*** (Tickell)

(Tickell's Willow Warbler, Tickell's Warbler)

Status: Unclear. Possibly a rare winter visitor. **Sightings**: Van der Wielen (1998) recorded a single at Chorao on 24th November 1998 and Lassey (2000) near the Dudhsagar waterfalls on 24th January 2000.

(1592) **Yellow-browed Warbler** ***Phylloscopus inornatus*** (Blyth)

(Inornate Leaf Warbler)

Status: Uncertain. Presumably a vagrant to Goa—as elsewhere in South India. **Sightings**: Pitt (1995) reported to have observed a single at the Bondla WS on 30th December 1994. Holt (1997) saw a single that was 'later prompted (by playback of a recording of its voice and another *inornatus* taped in China) to start calling—consistently and not the *inornatus*-like call that Hume's Warbler occasionally gives', at the edge of the Sinquerim marsh on 3rd November 1997.

(1590-1) **Hume's Warbler** ***Phylloscopus humei*** (Brooks)

(Hume's Yellow-browed Warbler, Buff-browed Warbler)

First reported by Willoughby (1993) who observed a single at the Bondla WS on 13th March 1993. **Status**: Uncertain. Possibly a rare or casual winter visitor. **Sites and sightings**: There are three records from the Bondla WS and one each from Tambdi Surla, Durgini, Mollem and Baga. **Observers**: Anon (1998a), Dennis (1999), Lassey (1999), Smithson (1996), Vermeulen (2000) and Wilson (1997). **Population**: All sightings were of single birds. **Seasonal status**: Records span the period from 15th November to 13th March.

(1578) **Tytler's Leaf Warbler** ***Phylloscopus tytleri*** Brooks

(Slender-billed Leaf Warbler)

Status: Uncertain. Holt (*in litt.* 2000) remarks: 'Protracted identification problems and misconceptions about the species' true distribution have clouded the status of this species throughout the subcontinent. Breeding in a very limited area of the Western Himalayas this near-threatened (Collar *et al.* 1994) warbler has long been known to winter in the Western Ghats and Nilgiris. Grubh and Ali (1975) collected a specimen, which they purported to be the only one from Goa, in Canacona, in early December 1972, but this has subsequently been re-identified as a Greenish Warbler *P. trochiloides* (Price 1980). Rasmussen (1998), in an authoritative paper on the species, noted that Whistler and Ticehurst (in unpublished papers housed at the Smithsonian Institution Archives) had, in a work in preparation prior to 1941, listed Goa as part of the species' range. The implication was that there must have been an earlier Goa-collected specimen for which the present disposition is unknown. There have been a good number of undocumented sight reports since Grubh and Ali's

claim. Harris (1986) noted three and Lainer (1999b) "believed [that he had] seen very small numbers of this confusing leaf warbler twice in the winter of 1985-86, in the Ghats and the coastal belt." However in light of the species' confused historical status and in the absence of a convincingly documented record I feel that it would be premature to include this species in the state's avifauna. However it breeds to the north and a population winters to the south, so its future occurrence in Goa is not altogether impossible or indeed implausible.' **Other sightings**: Lassey (1999) watched a single bird for 20 minutes at Bondla WS on 18th January 1999, Spalding (1998) a tentative one at Mollem on 20th February 1998 and Watts (1987) reported to have seen 10 birds in the Bhagwan Mahavir WS sometime between 11th and 13th March 1987.

[(1309-11) **Grey-breasted Laughingthrush *Garrulax jerdoni*** Blyth]

(White-breasted Laughingthrush, Jerdon's Laughingthrush)

Sighting: The only record of this Western Ghat endemic is by Rane (1984b) and his party who reported to have encountered a mixed species feeding flock that contained 14 individuals of this laughingthrush, on 7th April 1982, at *ca*. 800 metres near the Dudhsagar railway station. They were apparently watched for some time feeding in association with Jungle Babblers, Red-vented and Yellow-browed Bulbuls. **Remarks**: Dudhsagar railway station is at an altitude of exactly 252 metres. Nowhere 'near' is an altitude of '800 metres' to be found – the top of Dudhsagar waterfalls being at an elevation of only about 500 metres and the crest of the Ghats in the 'Goa gap' only about 600 metres high. According to Ali and Ripley (1983), the nearest representative of this species, the Coorg White-breasted Laughing Thrush *G j. jerdoni*, occurs at altitudes from 1500-1800 metres. Moreover, as Holt (pers. comm. 2000) points out, this species is never found in groups as large as '14 individuals' and never in mixed feeding parties. He continues: 'Despite its skulking nature it's surprising that this sedentary species has not been reported subsequently in the state but then, apart from Rane's sighting of a party of 'about 30' just over the border at Castle Rock in Karnataka the day before his Goan report, there are no other reports north of southern Karnataka!' This record should be dismissed as either a misidentification or the result of sloppy homework (see Rane's record of White-headed Starling *Sturnus erythropygius* in Goa).

[(887-8) **Hume's Short-toed Lark *Calandrella acutirostris*** Hume]

(Hume's Short-toed Lark)

Sightings: Anon (1998a), Dennis (1999), Lassey (2000), Lynes (1999) and Ransdale (1998) claimed to have identified up to 300 examples of this species between November and January of the years 1997, 1999 and 2000. All the observers that could be reached retracted their records when queried by Holt (*in litt*. 2000).

(1964) **Red Avadavat** ***Amandava amandava*** (Linn.)

Status: Either a vagrant or an escapee from captivity. **Sighting**: Smithson (1996) recorded a male along the track on edge of the Sinquerim marsh on 16th November 1996.

(1965) **Green Avadavat** ***Amandava formosa*** (Latham)

(Green Munia, *Estrilida formosa*)

Status: Either a vagrant or an escapee from captivity. **Sighting**: Lassey (1999) observed seven birds drinking at a stream at Tambdi Surla on 19th January 1999.

(1966) **Indian Silverbill** ***Lonchura malabarica*** (Linn.)

(White-throated Silverbill, White-throated Munia, *Euodice malabarica*)

Status: Uncertain. **Sightings**: Anon (1998a), Griggs (1996), Holt (1997), Lassey (1999) and Todd (2000) recorded up to six birds at Baga, Candolim and Fort Aguada between November and February of the years 1996 to 2000.

(2046) **Yellow-breasted Bunting** ***Emberiza aureola*** Pallas

Status: Vagrant. **Sightings**: A single bird found by Killian Mullarney in the fields at Baga on 25th November 1997 was joined by a second bird two days later. Both were then seen by numerous observers intermittently until at least 6th December. It was photographed by Carol and Peter Leigh (Holt *in litt*. 2000).

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Names of Places in Goa

Agarwaddo (Pernem) – village on the Chapora river, between Chopddem and Parshem
Agassaim (Tiswadi) – village on the Zuari
Agonda (Canacona) – coastal village
Aguada (Bardez) – fort, plateau and beach resort at the mouth of the Mandovi
Alorna (Pernem) – village and fort on the upper Chapora river
Amone (Canacona) – hamlet in the Cotigao WS
Anjuna (Bardez) – coastal village
Anjunem (Sattari) – village at the foot of the Western Ghats; site of a largish dam and lake
Anmod Ghat (Sanguem) -
Arambol (Pernem) – also: Harmal; coastal village
Arpora (Bardez) – village in the coastal belt
Arvalem (Bicholim) – village and waterfall
Assagao (Bardez) – village near Mapusa
Assonora (Bardez) – village

Backwoods Camp (Sanguem) -
Baga (Bardez) – ward of Arpora village; at the mouth of the Baga creek
Batim (Tiswadi) – village in the coastal belt
Benaulim (Salcete) – coastal village
Betim (Bardez) – village on the Mandovi; opposite Panaji
Betul (Salcete) – village at the mouth of the Sal river
Bicholim – taluka and taluka town
Bogmalo (Marmagoa) – coastal village
Bolcornem (Sanguem) – village between Mollem and Tambdi Surla
Britona (Bardez) – village on the northern bank of the Mandovi

Cabo de Rama (Canacona) – coastal headland and fort
Calangute (Bardez) – coastal village and beach
Camurlim (Bardez) – village on the Chapora river
Canacona – southernmost taluka
Cananguinim (Canacona) – coastal village near Cabo de Rama
Candolim (Bardez) – coastal village

Candollem (Quepem) – village in the midland region
Carambolim (Tiswadi) – also Karmali; village near Old Goa; site of a tank
Caranzol (Sattari) – hamlet at the foot of the Western Ghats
Caranzol (Sanguem) – hamlet and railway halt in the Bhagwan Mahavir WS
Castle Rock (Uttar Kanara distr., Karnataka) – railway station and village on the crest of the Ghats
Chandor (Salcete) – village in the plateau region
Chapora (Bardez) – also: Caisua; village at the mouth of the Chapora river; part of Anjuna
Chandranath hill – see: Sidhanath hill
Chauri (Canacona) – taluka town on the NH 17
Chinchinnim (Salcete) – village in the coastal belt
Chopddem (Pernem) – also: Chopdem; village on the Chapora river, opposite Siolim
Chorao (Tiswadi) – island in the inland estuary of the Mandovi
Ciba-Geigy (Tiswadi) – also: Novartis, Syngenta; the Santa Monica plant of Hindustan Ciba-Geigy (India) Ltd. at Corlim
Coduol (Sattari) – village at the foot of the Western Ghats
Collem (Sanguem) – also: Kule; village and railway station at the foot of the Western Ghats
Colva (Salcete) – coastal village
Corgal (Canacona) – village on the fringe of the Cotigao WS
Corlim (Tiswadi) – village near Old Goa; site of Ciba-Geigy
Cortalim (Marmagoa) – village on the Zuari, opposite Agassaim
Cumbarjua canal – semi-natural waterway connecting the Zuari and Mandovi rivers
Curca (Tiswadi) – village on the fringe of the Zuari basin
Curtorim (Salcete) – village in the coastal belt; site of several tanks; near Margao

Dabolim (Marmagoa) – village and site of an Indian Navy airfield and civilian airport
Dargal (Pernem) – also: Dhargal; village near NH 17
Dharbandora (Sanguem) – village on the NH 4A, between Ponda and Mollem
Devil's Canyon – stretch of the Khandepar river in the Bhagwan Mahavir WS
Divar (Tiswadi) - island in the inland estuary of the Mandovi river; comprising the villages of Piedade, St. Mattias and Goltim-Navelim.
Dona Paula (Tiswadi) – coastal village between the mouths of the Zuari and Mandovi
Dudhsagar (Sanguem) – waterfalls in the Bhagwan Mahavir WS

Farmagudi (Ponda) – village in the midland region; near Ponda
Fort Aguada (Bardez) – coastal headland and fort commanding the mouth of the Mandovi

Galgibagh (Canacona) – short river and village
Gaodongrem (Canacona) – village on the fringe of the Cotigao WS

Goa Meat Complex (Ponda) – abattoir between Khandepar bridge and Usgao
Goa Velha (Tiswadi) – village in the coastal belt
Golaulim (Sattari) – village at the foot of the Western Ghats
Gudem (Bardez) – village at the estuary of the Chapora river; part of Siolim
Guirim (Bardez) – village near Mapusa

Ilhas – also: Tiswadi; taluka of North Goa
Issorcim (Marmagoa) – coastal village near Dabolim airport

Kadamba plateau (Tiswadi) – extensive lateritic plateau near Panaji
Kalay (Sanguem) – also: Callem; village and railway station
Karmal Ghat (Quepem) – also: Kharmal; *ghat* section of NH 17 between Cuncolim and Chauri
Keri (Pernem) – also: Querim; village on the mouth of the Terakol river, opposite Terakol
Khandepar (Ponda) – also: Candepar; village on the Khandepar river, a tributary of the Mandovi
Kindlebagh (Canacona) – village at the mouth of the Talpona river; part of Palolem
Kiranpani (Pernem) – hamlet near the mouth of the Terakol river

Macasana (Salcete) – village; part of Curtorim
Madkai (Ponda) – also: Marcaim; village at the confluence of the Zuari and Cumbarjua canal
Maem todi (Salcete) – irrigation tank at Macasana
Mairem (Sanguem) – hamlet in the Bhagwan Mahavir WS; near the crest of the Western Ghats
Malim (Bardez) – village on the Mandovi, opp. Panaji
Mandrem (Pernem) – coastal village
Mapusa (Bardez) – also: Mapuca, Mapsa; taluka town in North Goa
Margao (Salcete) – large taluka town
Marlem (Canacona) – hamlet on the Karnataka border of the Cotigao WS
Marmagoa – also: Mormugao; taluka in South Goa and sea port
Maxem (Canacona) – village on the NH 17
Mayem (Bicholim) – also: Maem; village near Bicholim; site of a tank
Miramar (Tiswadi) – suburb of Panaji; beach at the mouth of the Mandovi
Mobor (Salcete) – coastal village
Monte Guirim (Bardez) – hillock in Guirim village
Mormugao – see: Marmagoa
Merces (Tiswadi) – village in the coastal belt; near Panaji
Mollem (Sanguem) – also: Mollem; village at the foot of the Western Ghats
Morjim (Pernem) – village at the mouth of the Chapora river

Nadkem (Canacona) – village in the Cotigao WS
Nagoa (Bardez) – village in the coastal belt; part of Arpora

Nandan (Sanguem) – hamlet in the Bhagwan Mahavir WS; now abandoned
Nanorem (Sattari) – hamlet at the foot of the Western Ghats
Nanuz (Sattari) – also: Nanus; village near Valpoi
Naroa (Bicholim) – also: Narva; village on the Mandovi
Nerul (Bardez) – village at the mouth of the Mandovi river
Neturlim (Sanguem) – also: Netravali; village on the banks of the upper Zuari
Neura (Tiswadi) – village; site of extensive saline marshes
Novartis – see Ciba-Geigy
Nuem (Quepem) – coastal hamlet between Cananguinim and Cabo de Rama

Old Goa (Tiswadi) – historical capital of Goa, now a village on the banks of the Mandovi
Orlim (Salcete) – coastal village
Oxel (Bardez) – village on the Chapora river; part of Siolim

Palolem (Canacona) – coastal village
Paliyem (Pernem) – village on the inland estuary of the Terakol river
Panaji (Tiswadi) – also: Panjim, Pangim; large taluka town and capital of Goa
Parra (Bardez) – village in the coastal belt
Parshem (Pernem) – also: Parxem; village
Pendral (Sattari) – hamlet at the foot of the Western Ghats
Pilar (Tiswadi) – village in the coastal belt
Pilerne (Bardez) – village bordering the plateau region
Poinguinim (Canacona) – village on the NH 17
Polem (Canacona) – Goa's southernmost village; check-post on the Karnataka border
Pomburpa (Bardez) – village at the inland estuary of the Mandovi
Ponda – taluka and town
Porvorim (Bardez) – large village on the NH 17, between Mapusa and Panaji

Rachol (Salcete) – village on the Zuari
Rajbagh (Canacona) – village at the mouth of the Talpona river
Reis Magos (Bardez) – village on the Mandovi, opposite Panaji; part of Verem
Ribandar (Tiswadi) – village on the Mandovi between Panaji and Old Goa

Sada headland (Marmagoa) – coastal headland at the mouth of the Zuari
Sal (Salcete) – river flowing from Verna past Margao to Betul
Saligao (Bardez) – village in the coastal belt
Sancoale (Marmagoa) – also: Sankval; village and railway station
Sancordem (Sanguem) – village on the eastern rim of the midland region
Sanguem – taluka and taluka town in South Goa
Sangolda (Bardez) – village in the coastal belt
Sanquelim (Bicholim) – town on the border between Bicholim and Sattari talukas
Santa Cruz (Tiswadi) – also: Calapur; village next to Panaji

Sao Jacinto (Marmagoa) – small island in the estuary of the Zuari river
Sao Pedro (Tiswadi) – village on the Mandovi, near Old Goa
Sattrem (Valpoi) – hamlet at the foot of the Western Ghats
Savoi-Verem (Ponda) – village near the Mandovi
Selaulim (Sanguem) – village near Sanguem; site of a dam and lake
Shiroda (Ponda) – village bordering the plateau region
Shirotim (Canacona) – coastal valley north of Agonda
Shristhal (Canacona) – also: Shri Mallikarjun; village near Cotigao WS
Sidhanath hill (Salcete) – also: Chandranath hill; hill and temple near Quepem
Sinquerim (Bardez) – village in the coastal belt
Siolim (Bardez) – village on the Chapora river
Socorro (Bardez) – village near the NH 17
Sodiem (Bardez) – village in the coastal belt
Sonaulim (Sanguem) – hamlet and railway halt in the Bhagwan Mahavir WS
St. George's Island – islet off Bogmalo Beach (Marmagoa)
Surla (Sattari) – Goa's only village on the crest of the Western Ghats; near Valpoi
Syngenta – see Ciba-Geigy

Talaulim (Tiswadi) – also: Telaulim, Santana; village in the coastal belt
Taleigao (Tiswadi) – suburb of Panaji
Talpona (Canacona) – village at the mouth of the Talpona river
Tamdi Surla (Sanguem) – village in the Bhagwan Mahavir WS; at the foot of the Western Ghats
Terakol (Pernem) – also: Tirakol, Terekhol; Goa's northernmost village; at the mouth of the Terakol river
Tikanem (Tiswadi) – village on Chorao island
Tirval (Canacona) – hamlet in the Cotigao WS
Tiswadi – also: Ilhas; taluka of North Goa
Tivim (Bardez) – village
Tuem-Arabo (Pernem) – village near Dhargal

Usgaon (Ponda) – village near Bondla WS
Utorda (Salcete) – village in the coastal belt

Vagheri hill (Sattari) – also: Vagueri; said to be Goa's highest hill (*ca.* 790 m)
Valpoi (Sattari) - taluka town at the foot of the Western Ghats
Varca (Salcete) – coastal village
Velim (Salcete) – village in the coastal belt; site of a tank
Velsao (Mormugao) – coastal village
Verem (Bardez) – village at the mouth of the Mandovi
Verla-Canca (Bardez) – village in the coastal belt

ZAC reservoir (Marmagoa) – artificial freshwater reservoir of the Zuari Agrochemicals Ltd.; on the Sancoale plateau
Zuarinagar (Marmagoa) – shantytown between Sancoale and Velsao, in the vicinity of Zuari Agrochemicals Ltd.

Index

The index incorporates all common and scientific names used by Ripley (1982), Inskipp *et al.* (1996) and Manakadan and Pittie (2001).

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Birds of Goa

Over the past decade and a half, Goa has emerged as India's foremost destination for ornithologists and birdwatchers flying in from the rest of the country as well as Europe.

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The author, Heinz Lainer, was born in 1943 in Munich, Germany. He developed a serious interest in birdwatching and bird-banding even while he was training as an industrial chemist. After travelling extensively in Africa and Asia, he settled down in Goa in 1974 where he has been residing since almost without interruption. He has published a number of papers on Goan birdlife in the *Journal of the Bombay Natural History Society*.

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